

Heterogeneous Distributed Environment

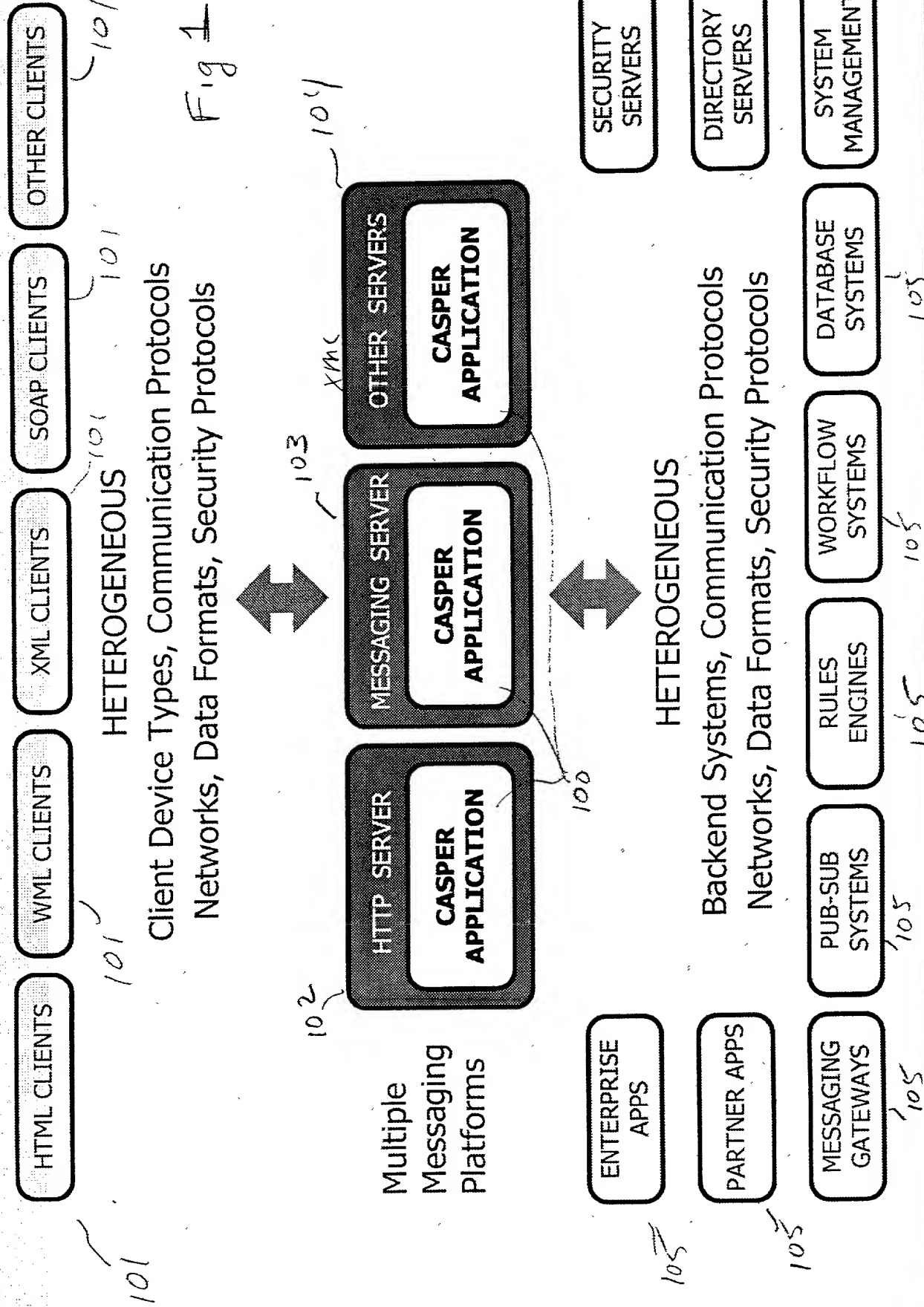
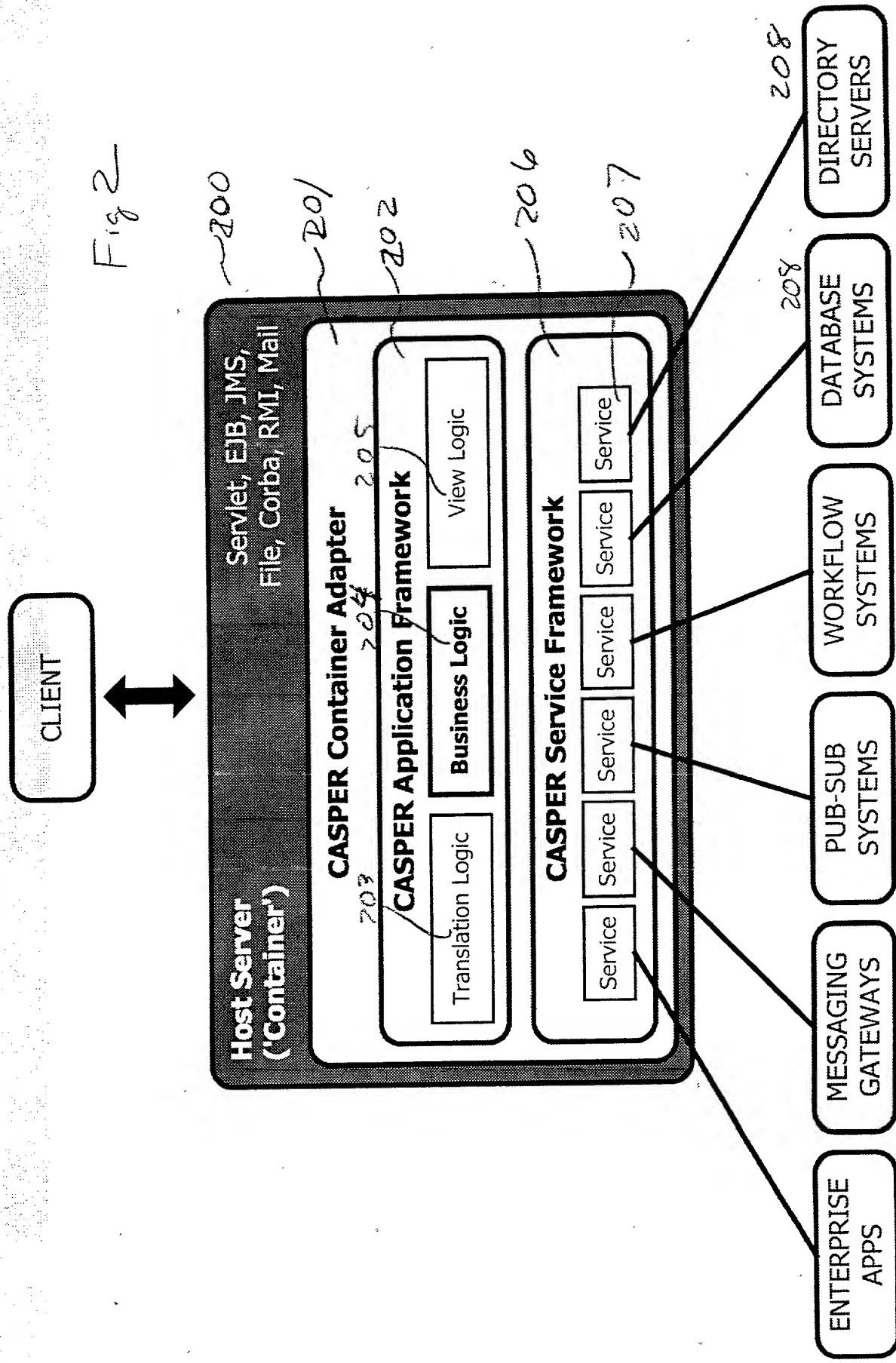
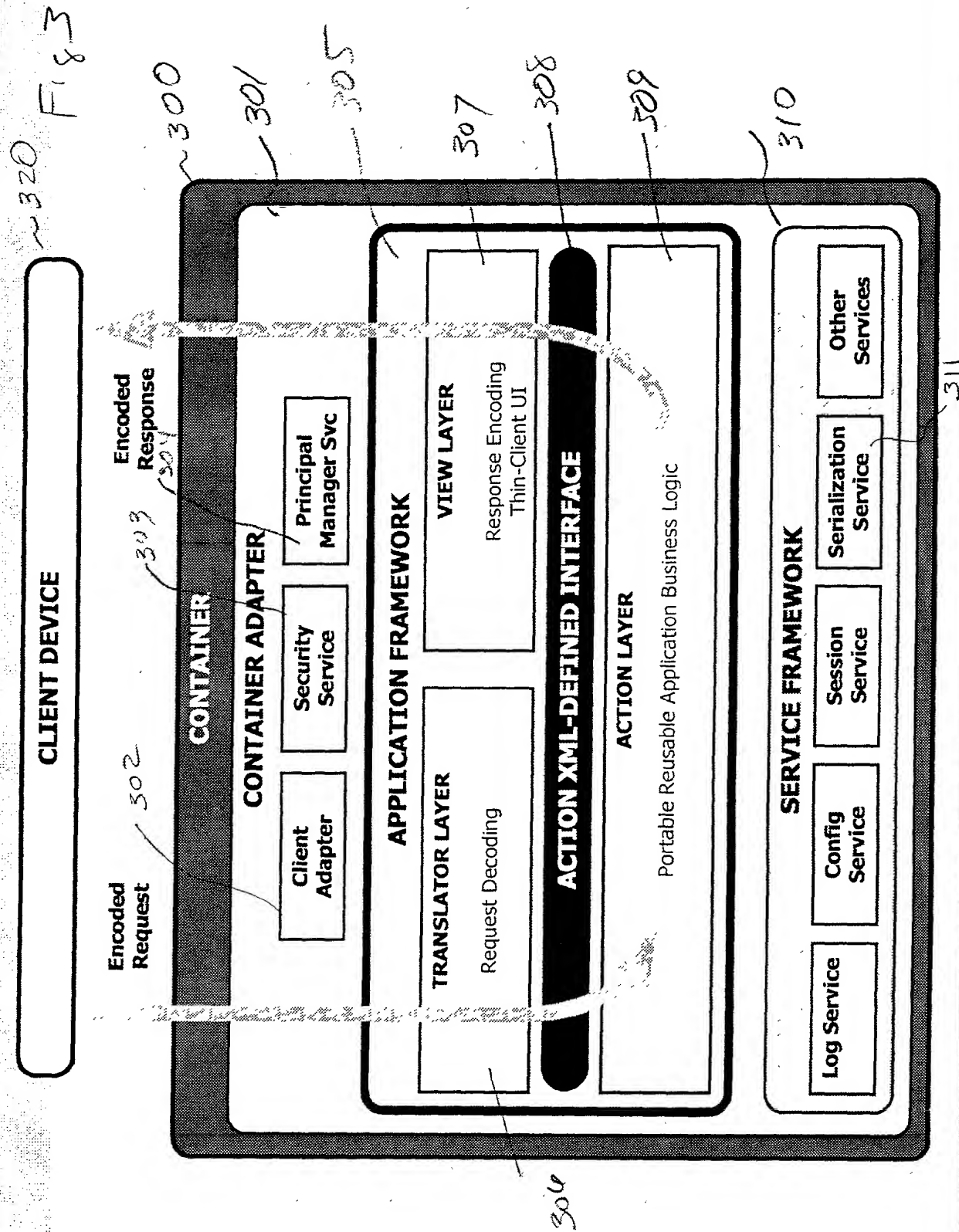


Fig 1

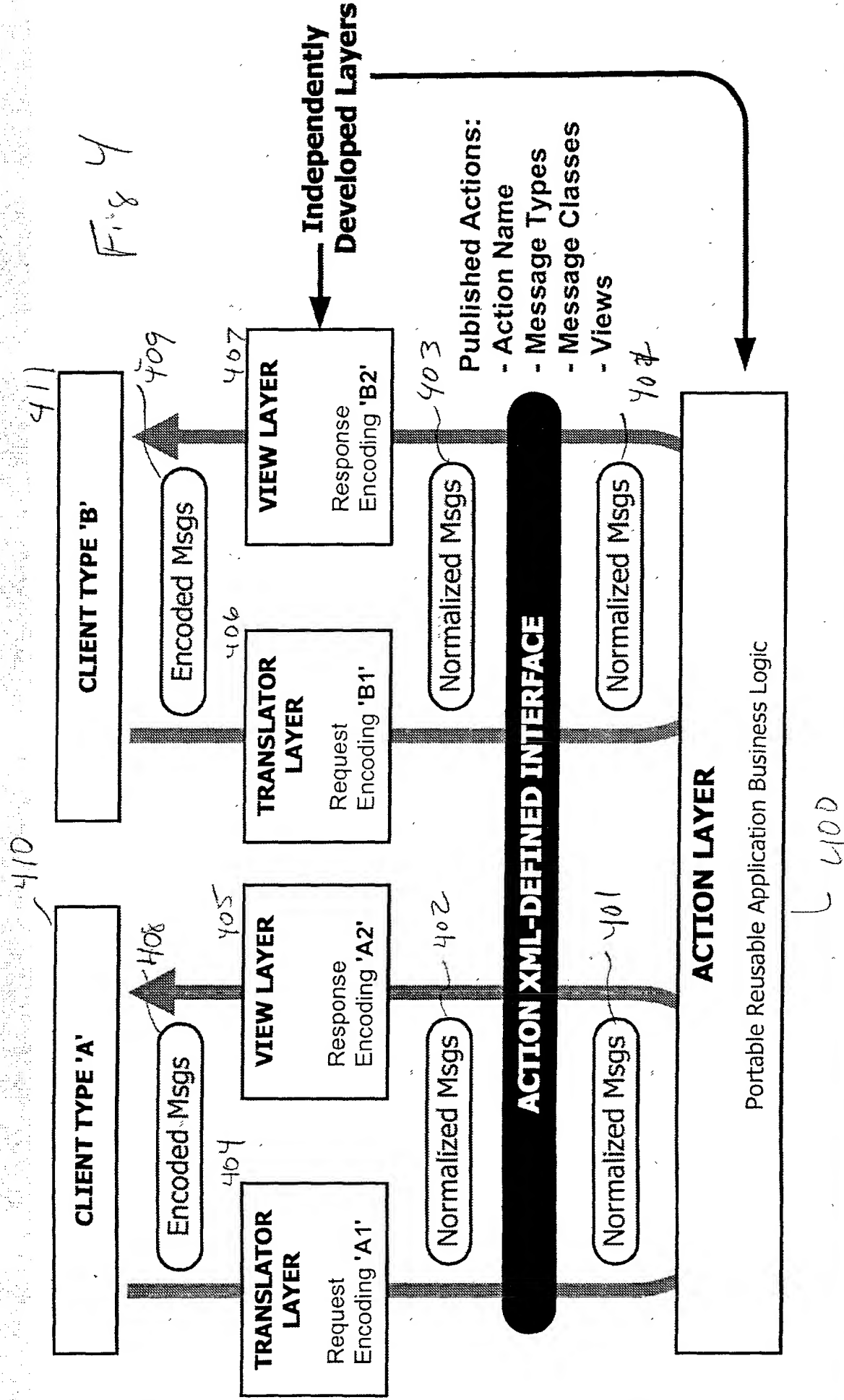
Container and Framework Overview



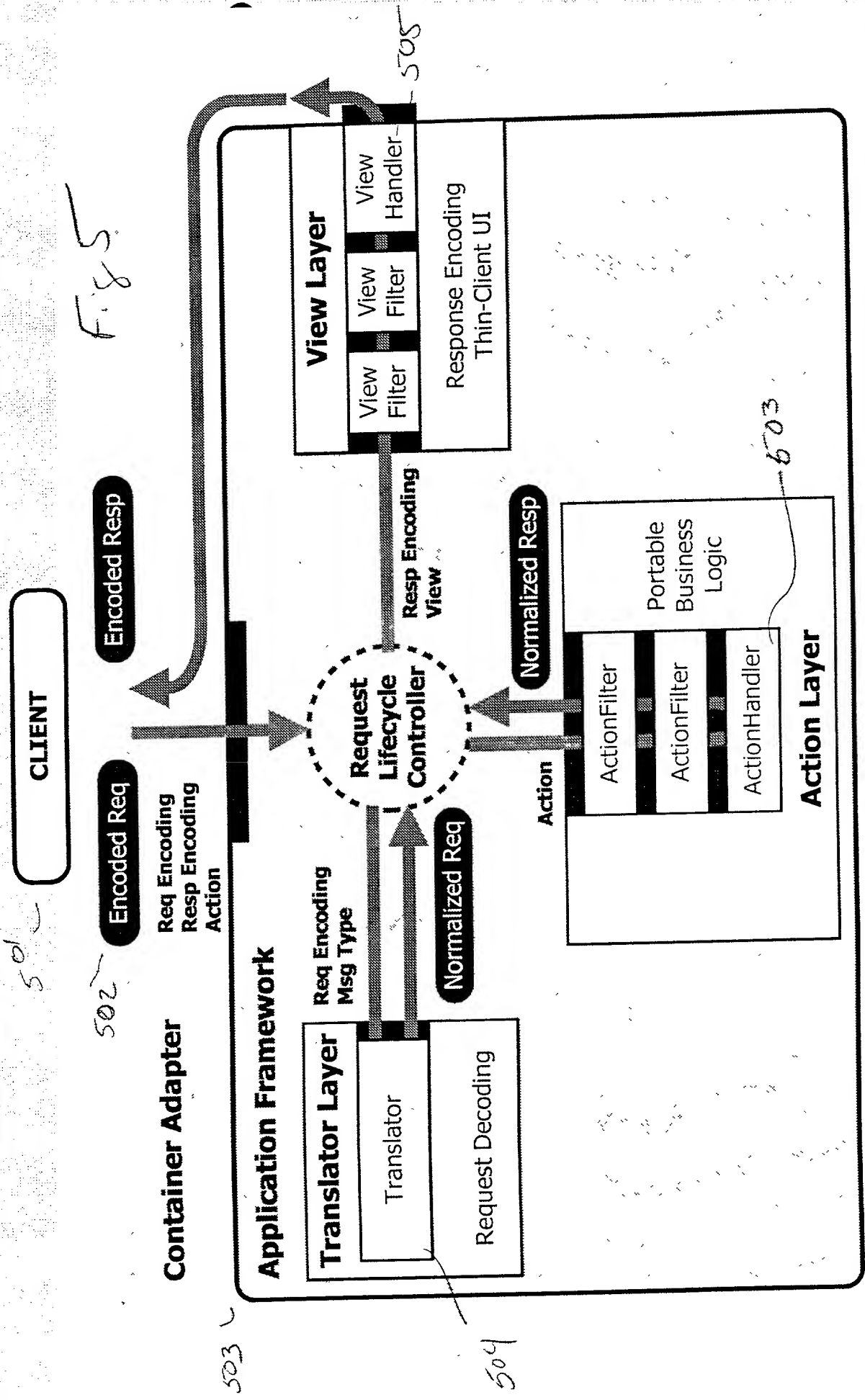
Application Framework Overview



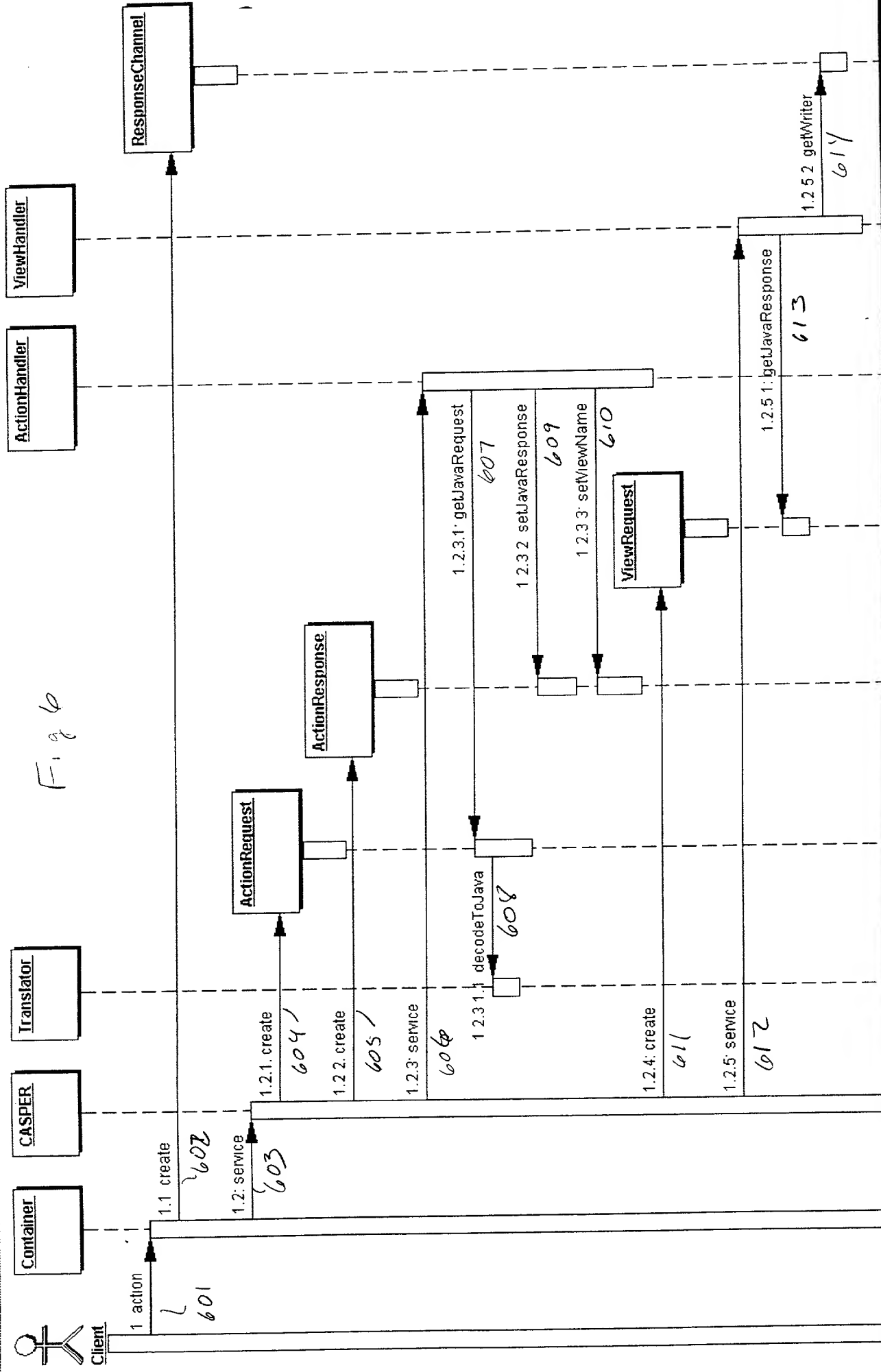
Published XML-Defined Action Interface



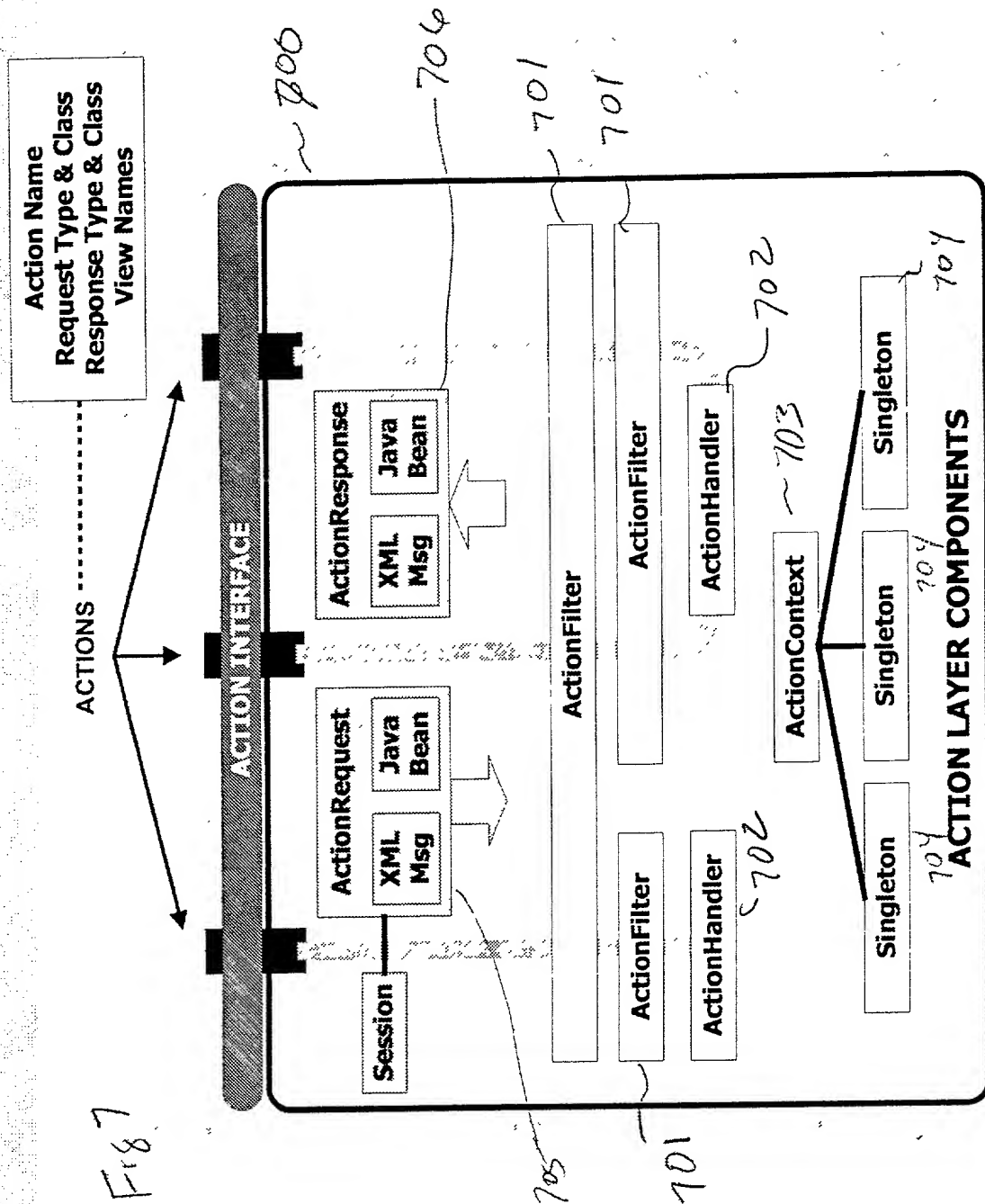
Application Request Lifecycle Overview



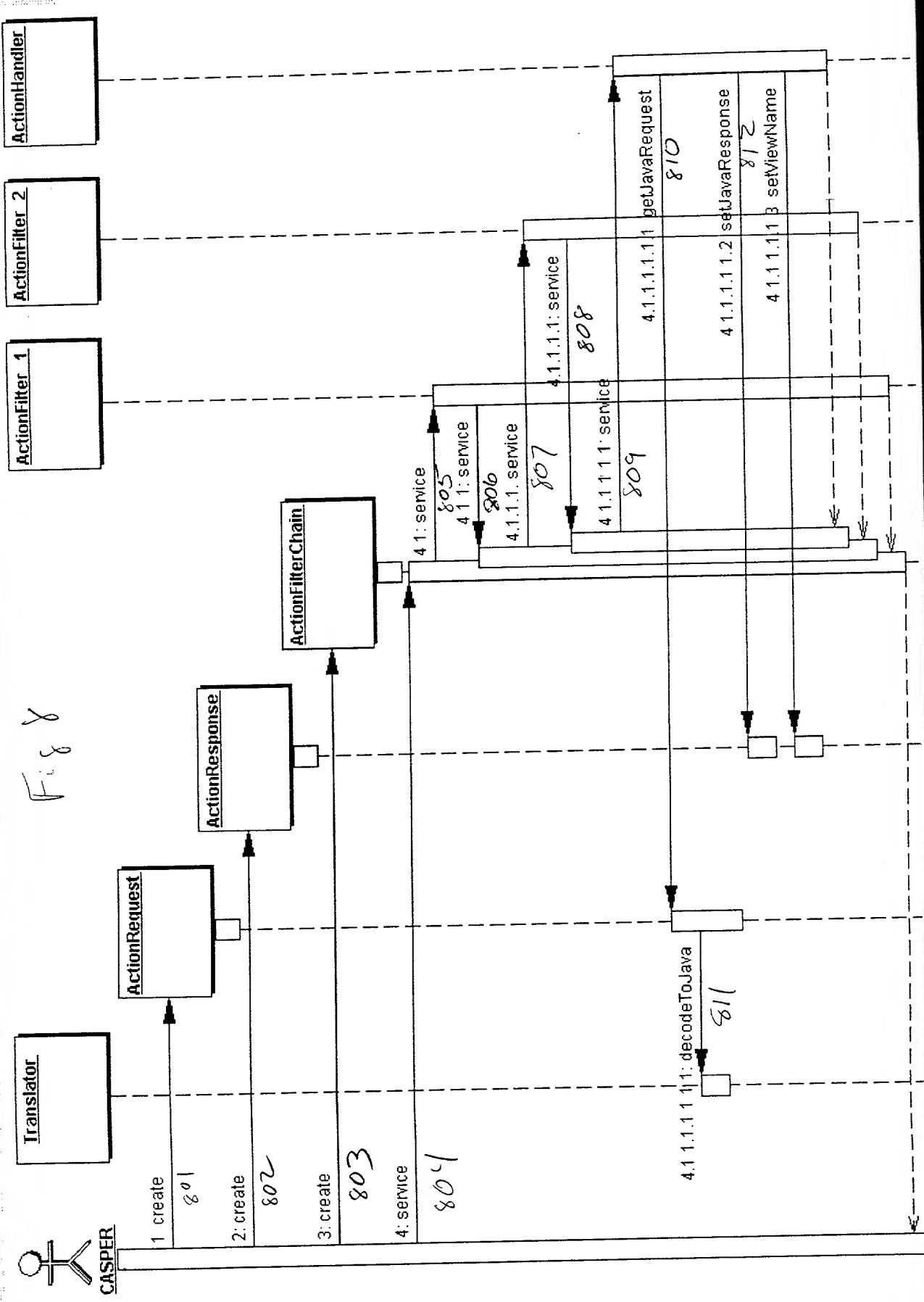
Application Request Sequence Overview



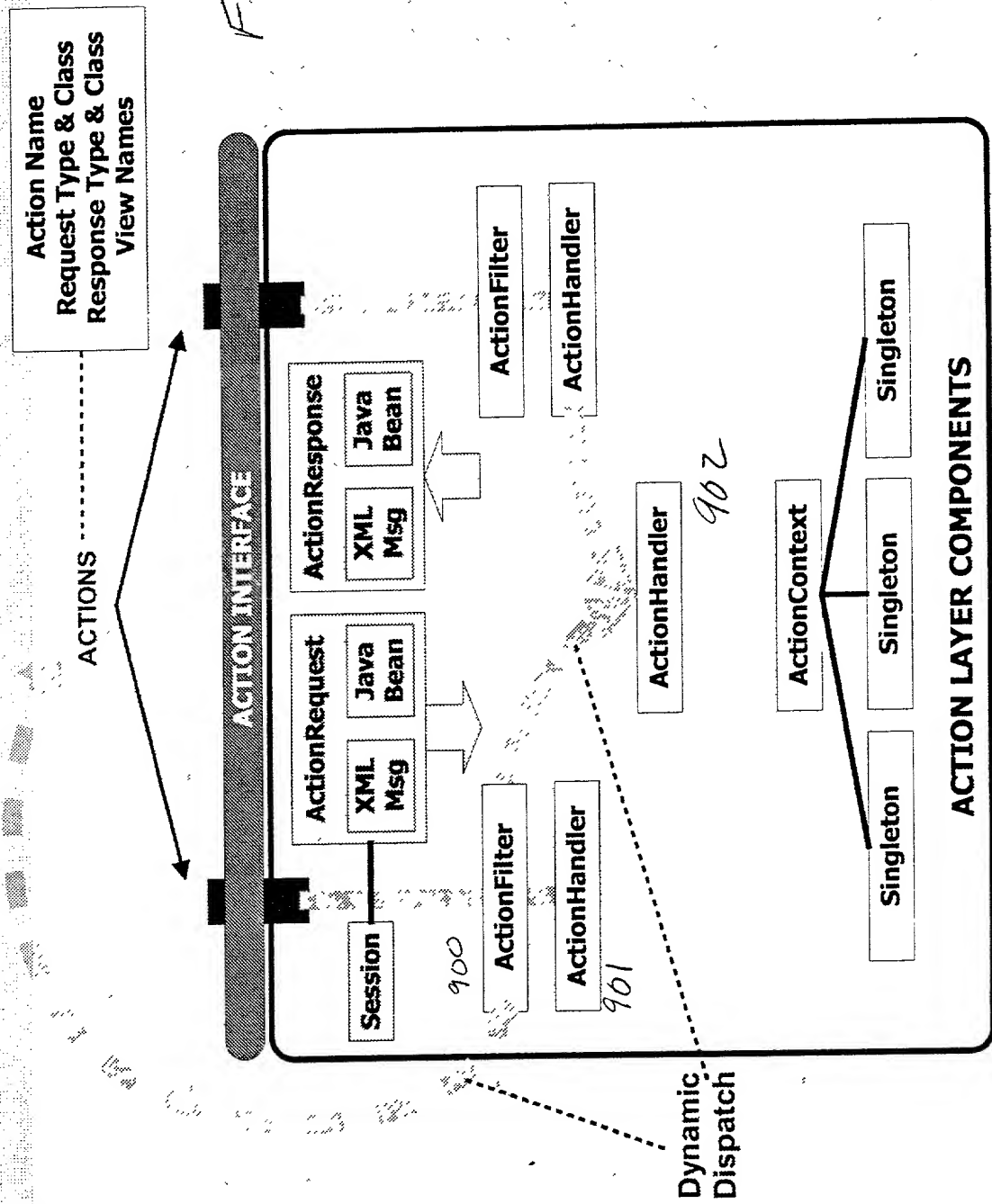
Action Layer Components



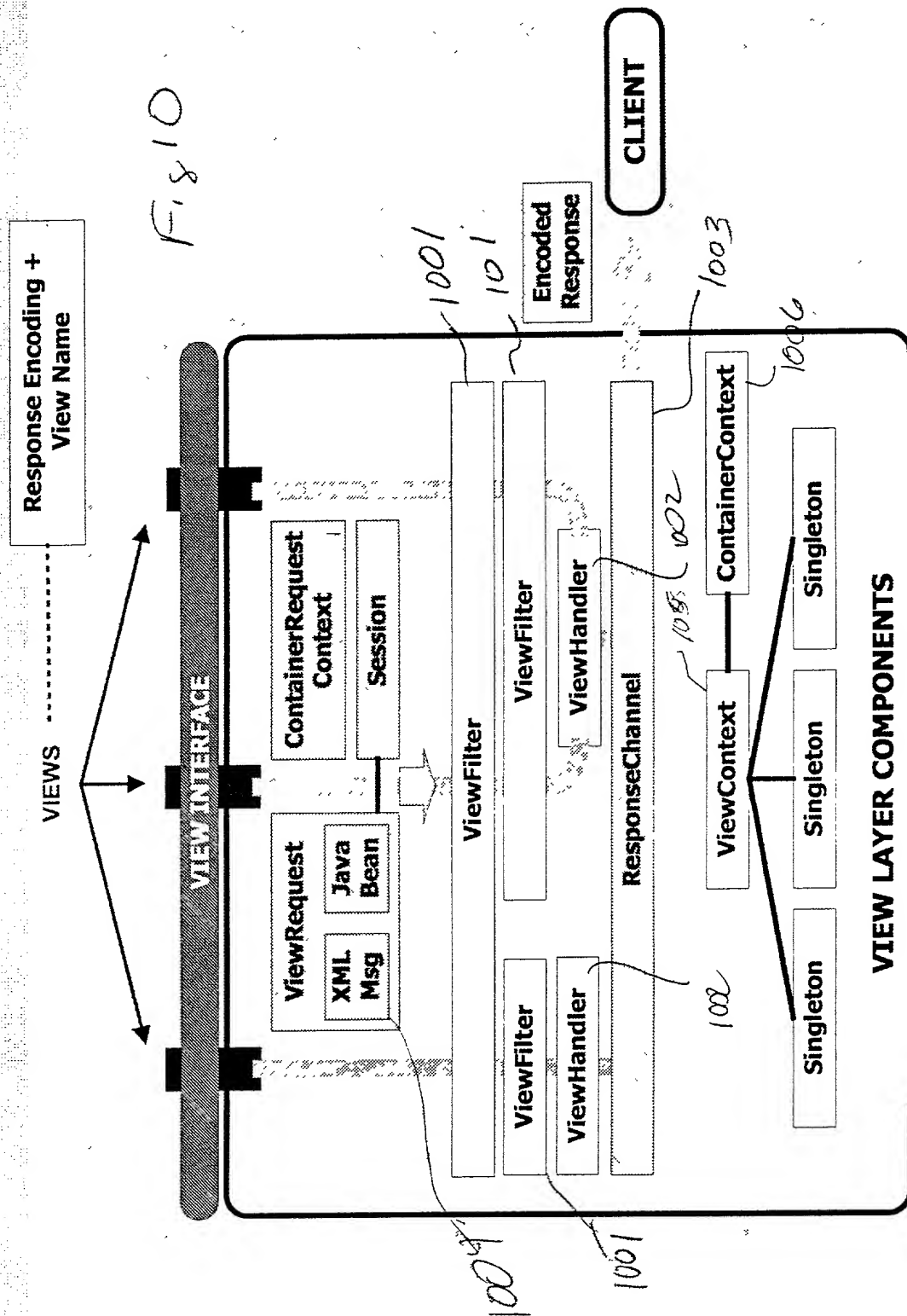
Action Layer Request Sequence Overview



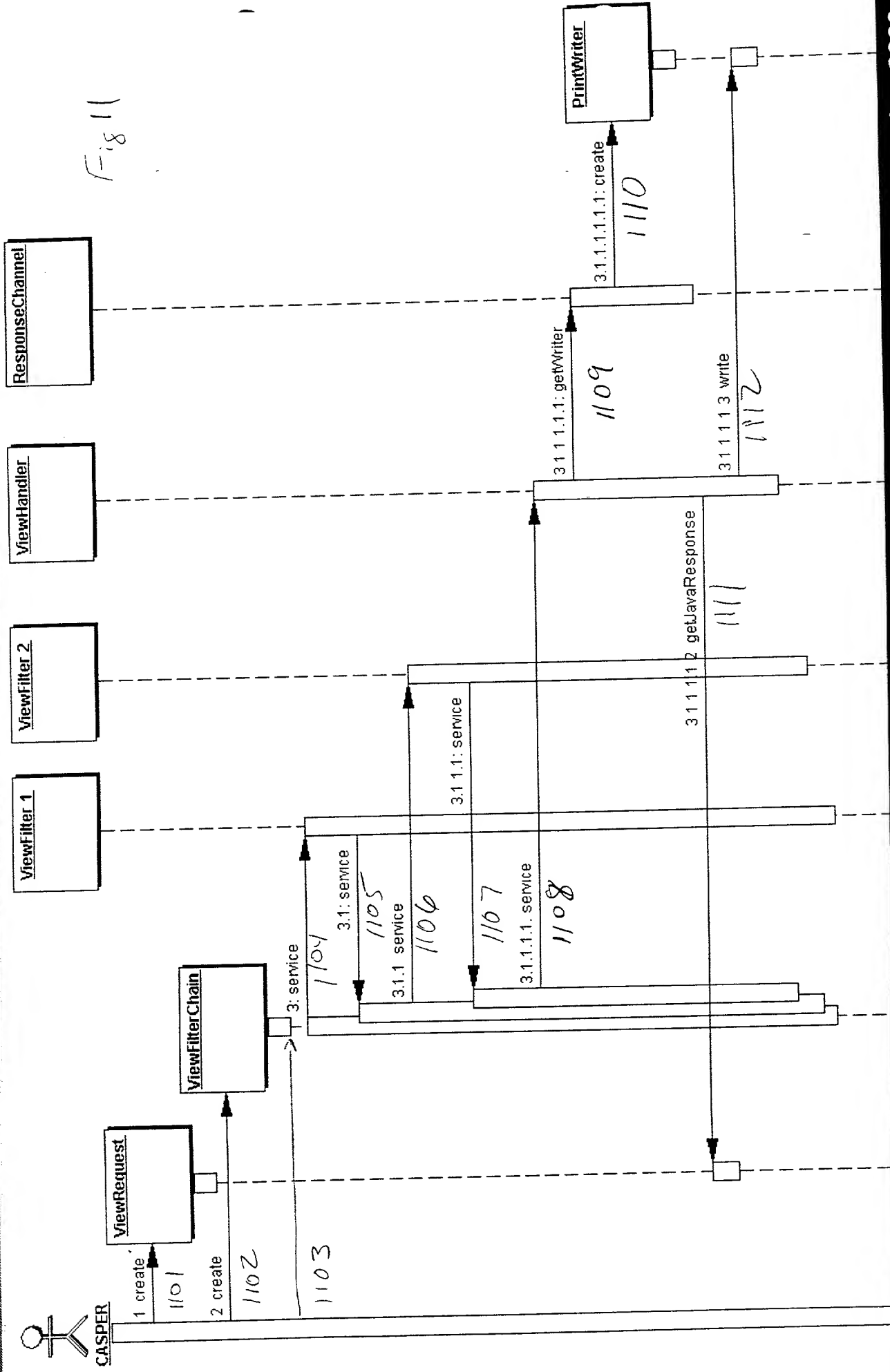
Action Layer Dynamic Dispatch



View Layer Components

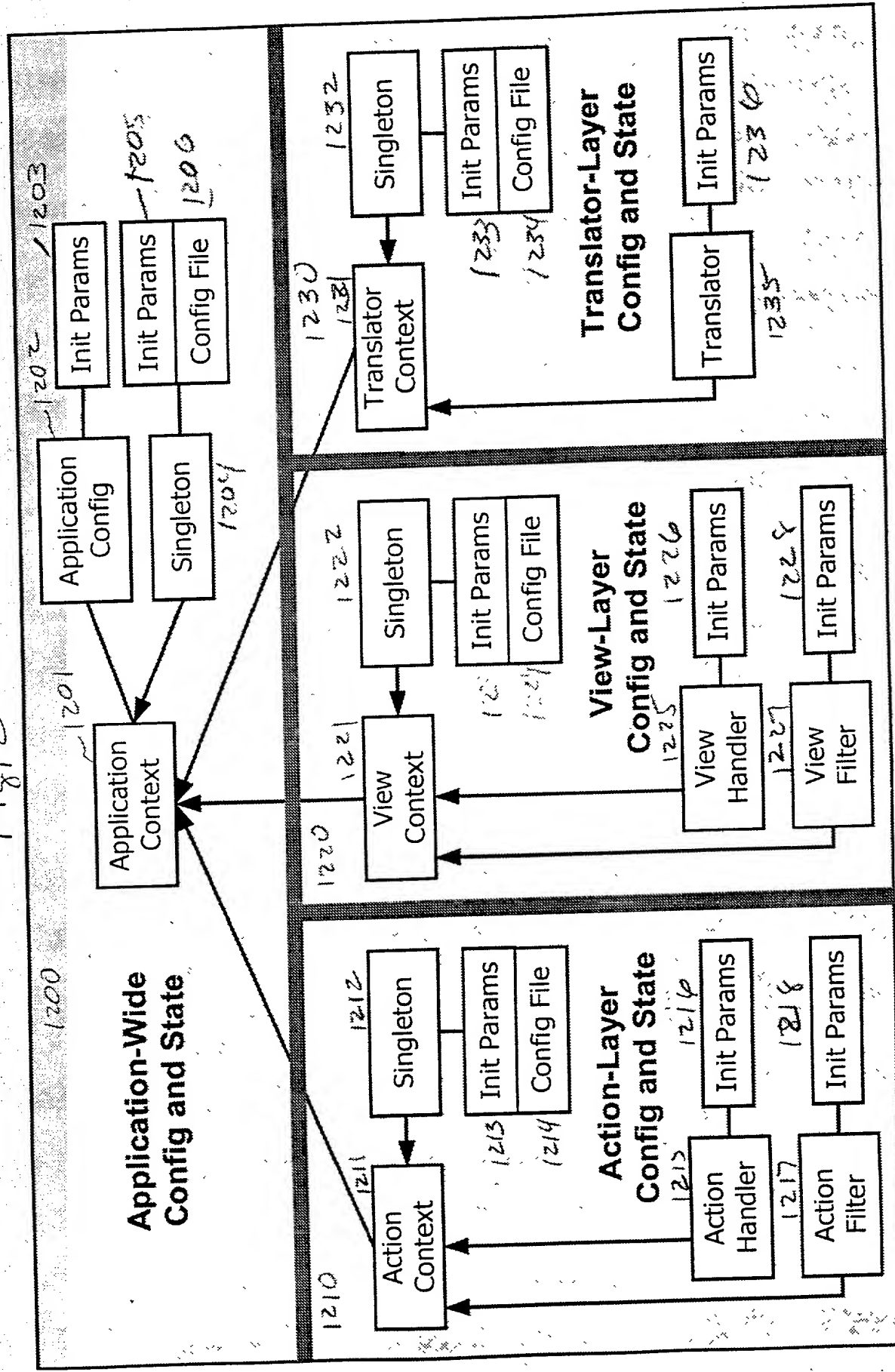


View Layer Request Sequence Overview



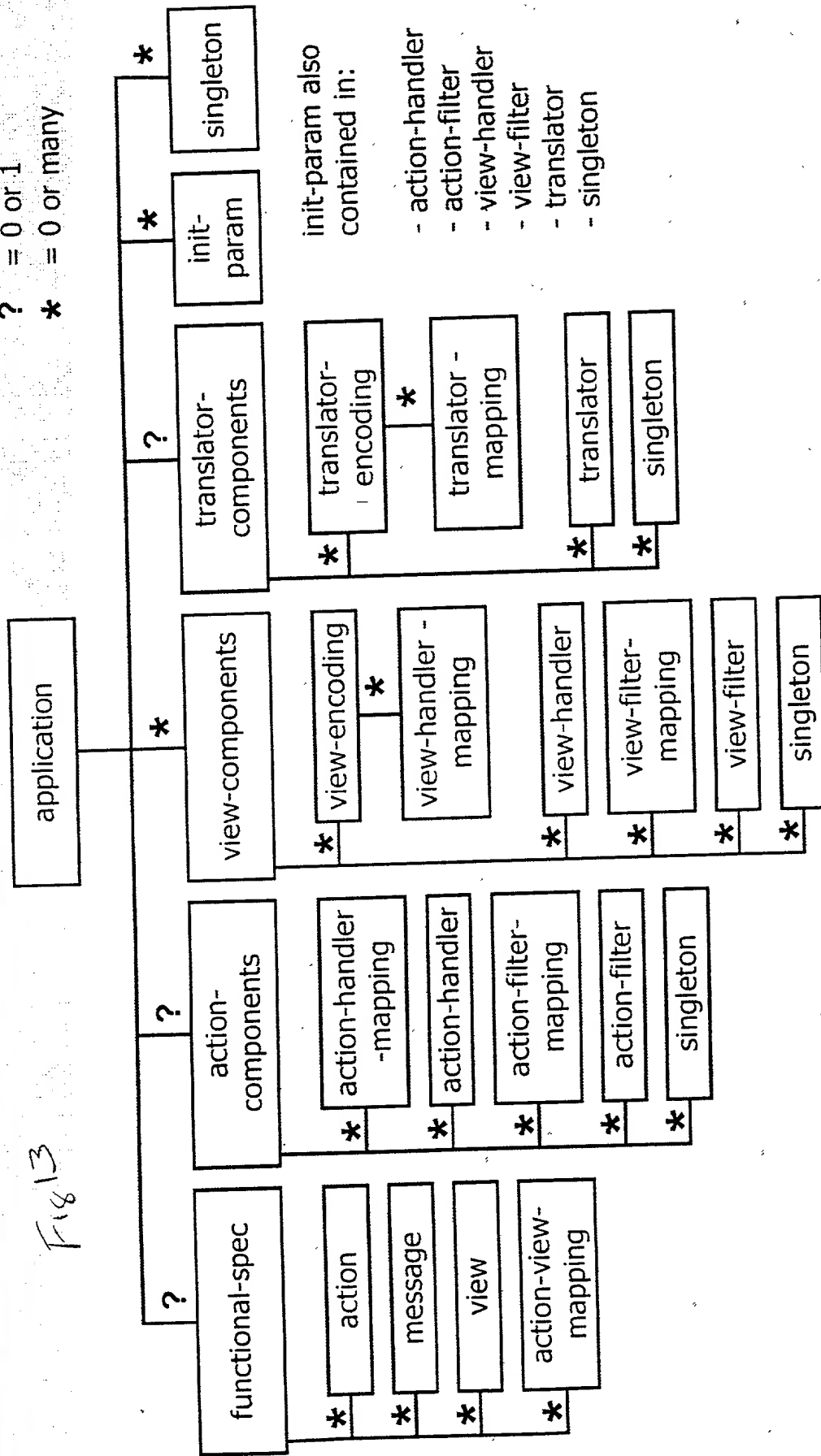
Configuration And State Architecture

Fig 12



casper-application.xml structure

? = 0 or 1
* = 0 or many



```

<!DOCTYPE application
PUBLIC "-//GE CASPER//DTD config casper-application-1.0//EN"
"http://casper.ge.com/dtd/config/casper-application-1.0.dtd">
  
```

Action Table

Action	application request format	application response format	Dispatcher
get product	get-product req	product-description resp	

filter
:
:
:
Action Handler

Fig 14

1401

1402

Translator Table

client request format	application request format	dispatcher
nv pair	any	

Translator

Fig 15

1602

1601

View Table

client response format	view	view dispatcher
html	product view	

filter
:
:
:
view handler

Fig. 16

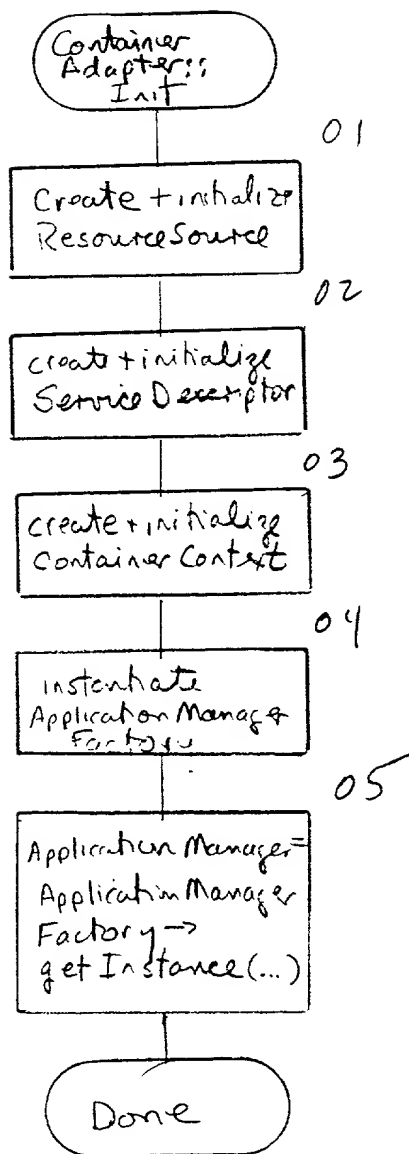
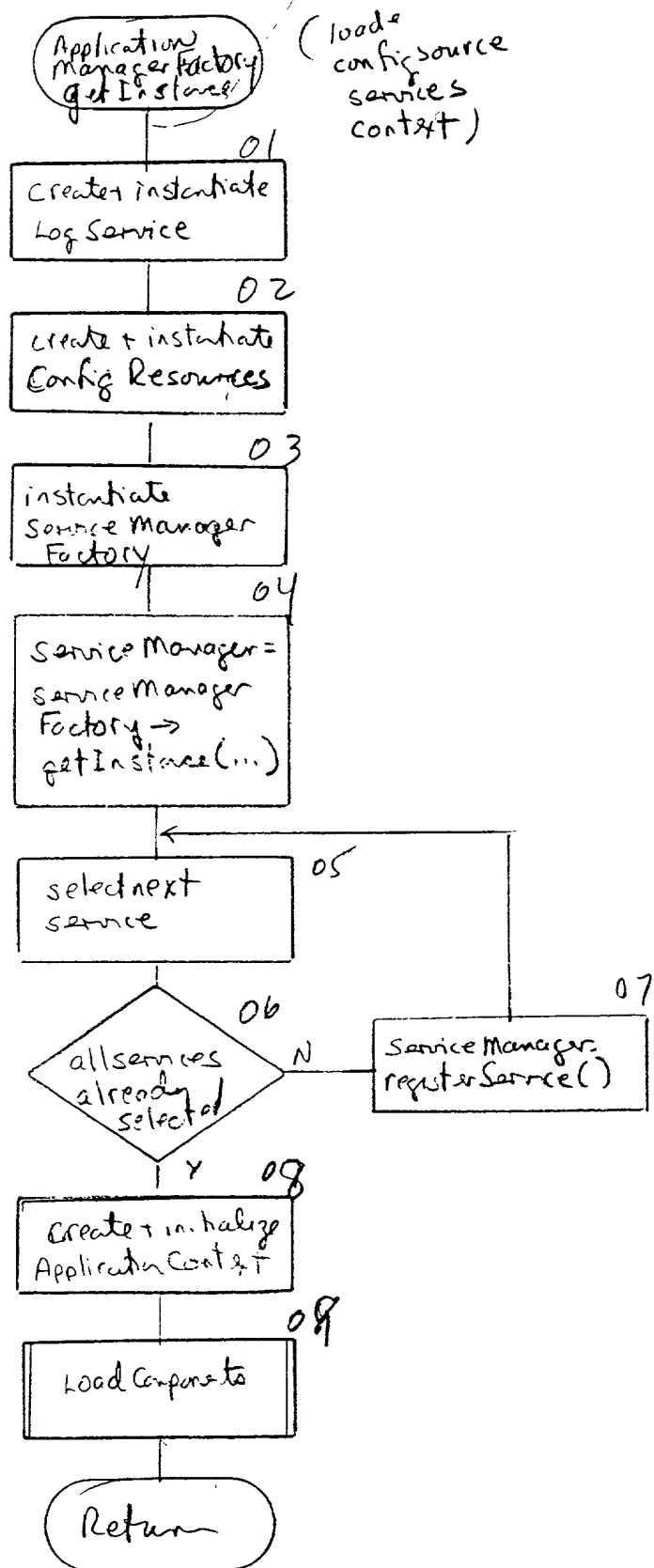


Fig 17



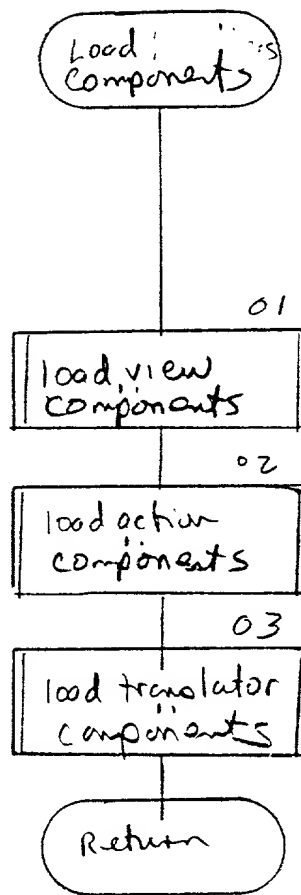


FIG. 19

FIG. 20

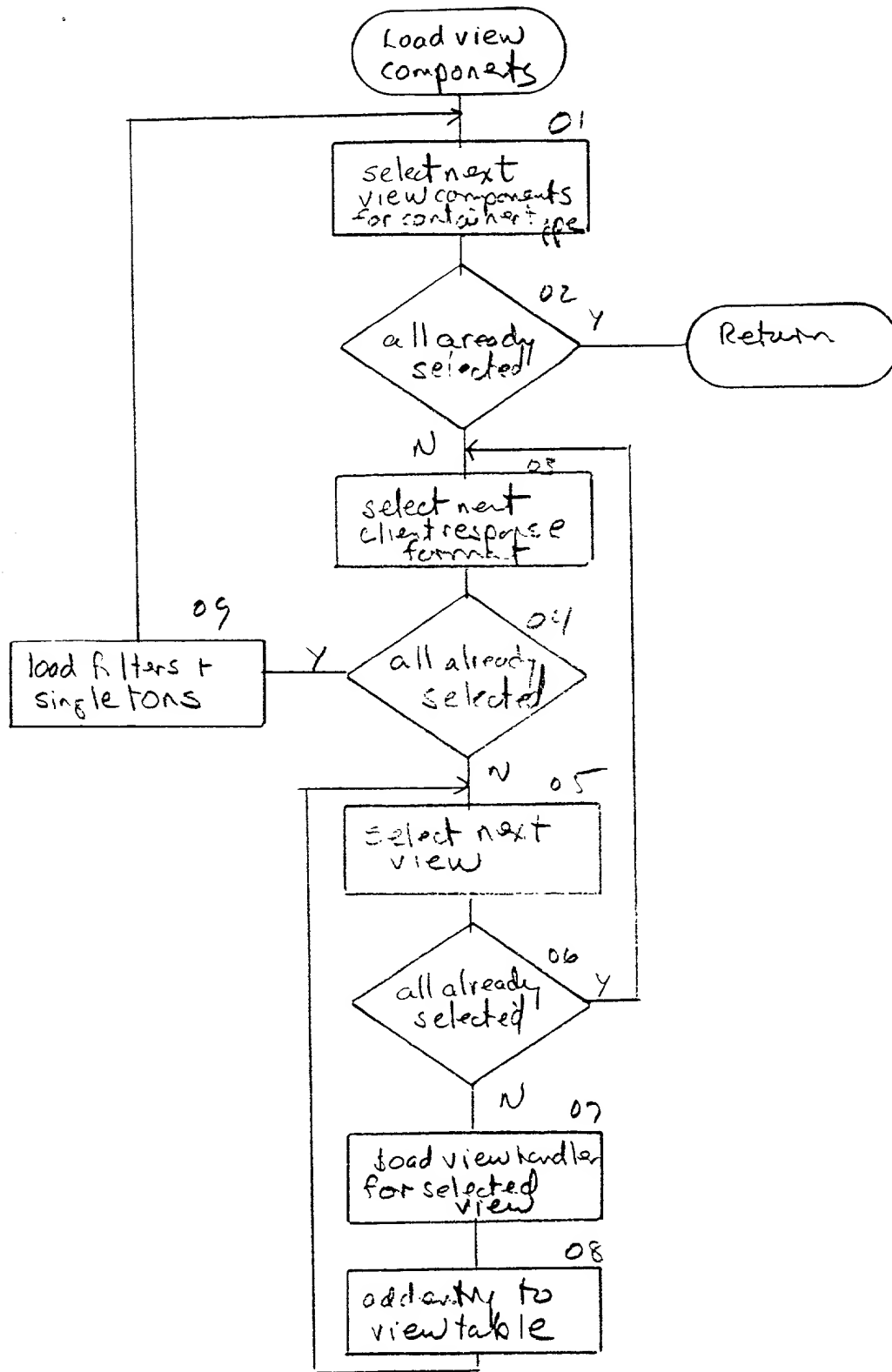


Fig. 20

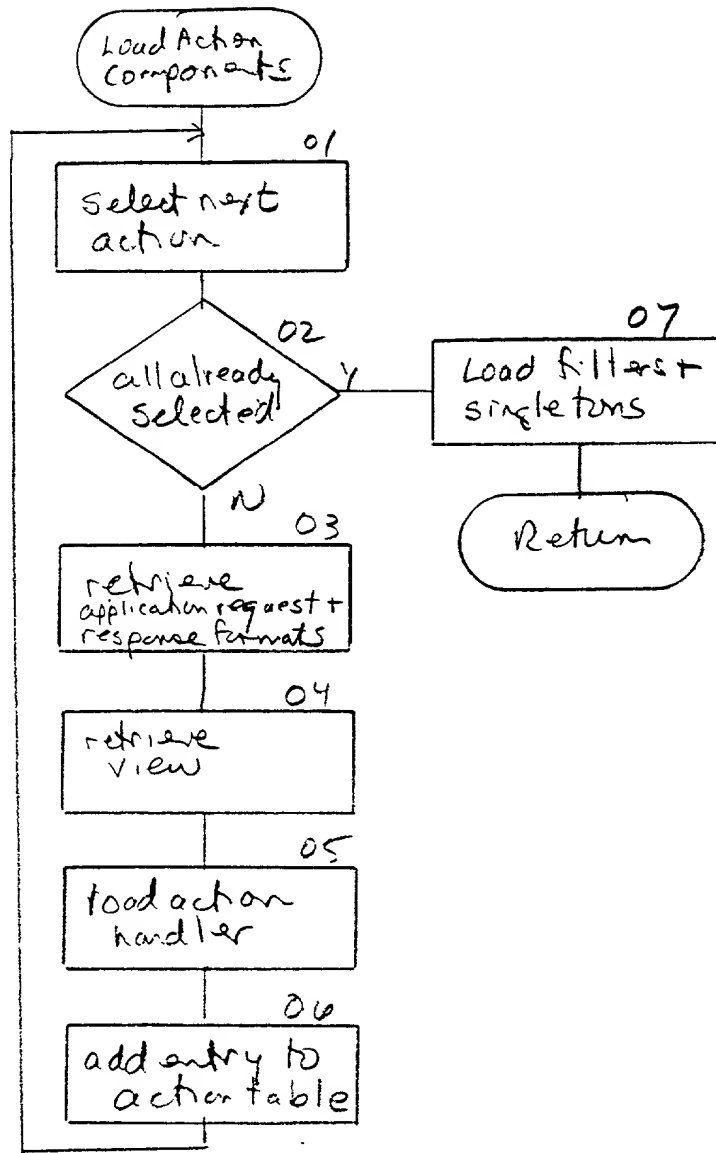


Fig. 21

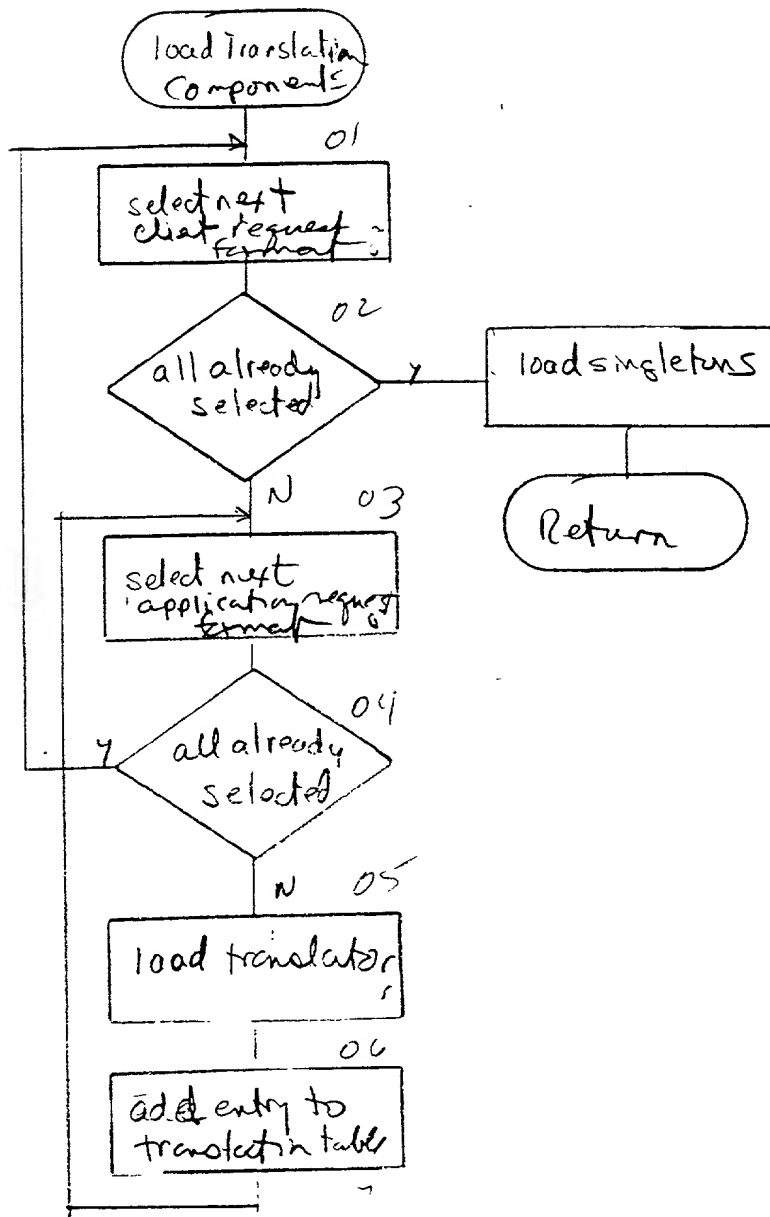


Fig 22

09755599.0102021

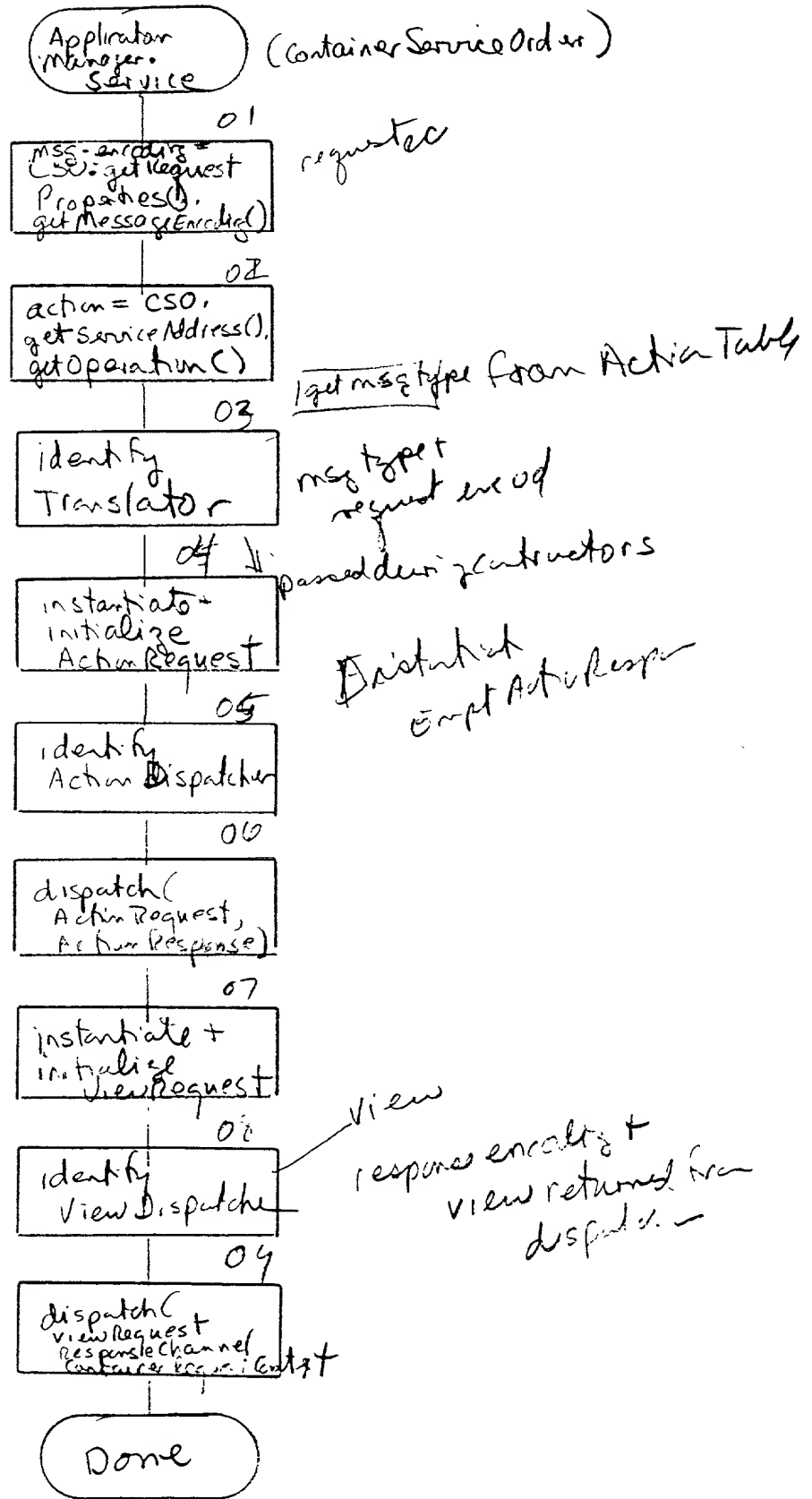


Fig. 23

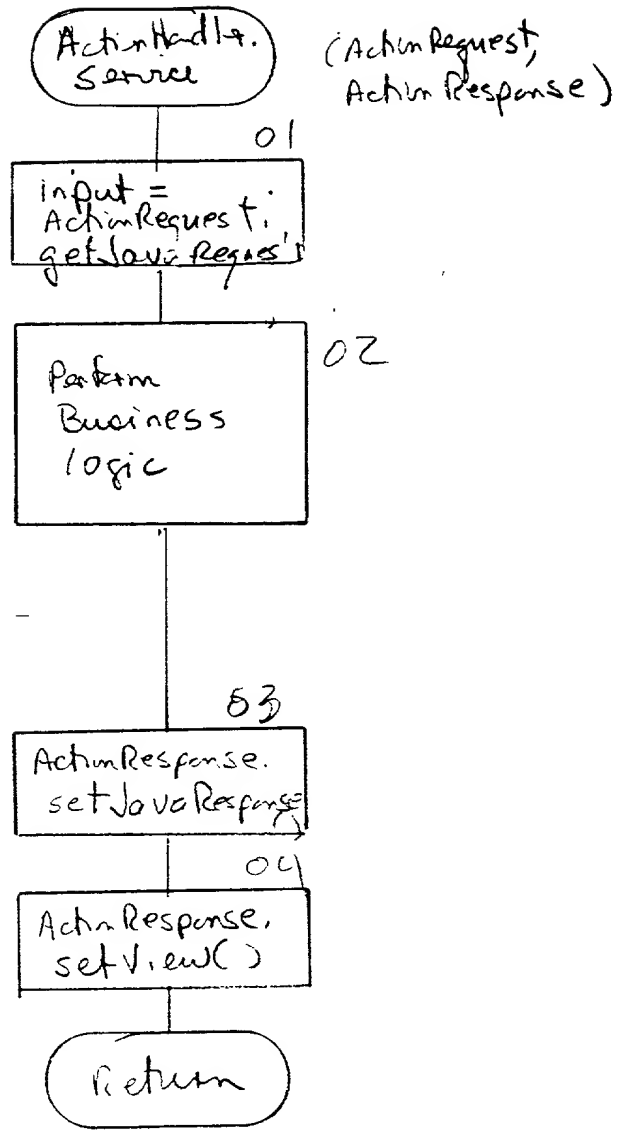


Fig. 24

Service Framework Overview

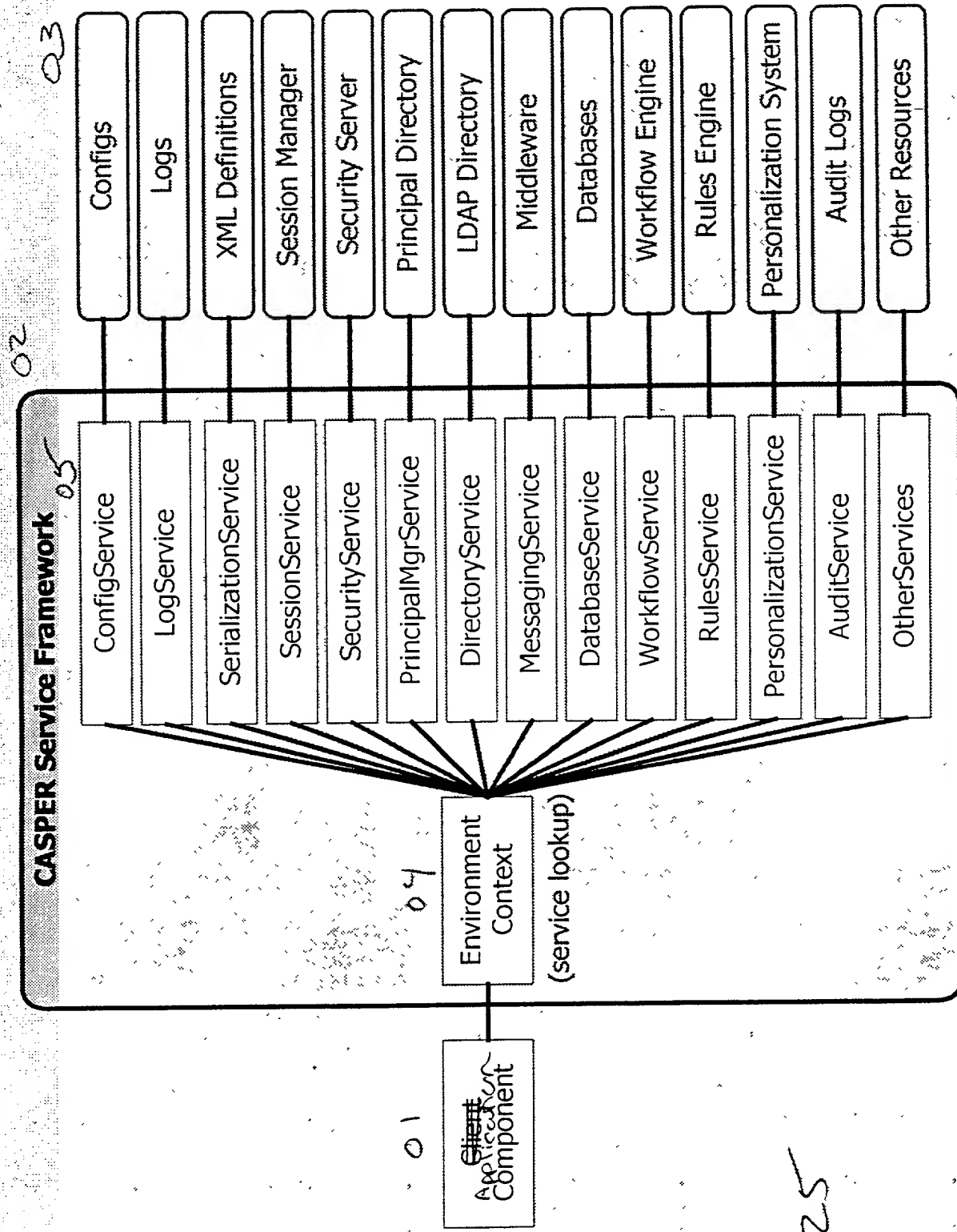


Fig 25

Service Classes & Interfaces

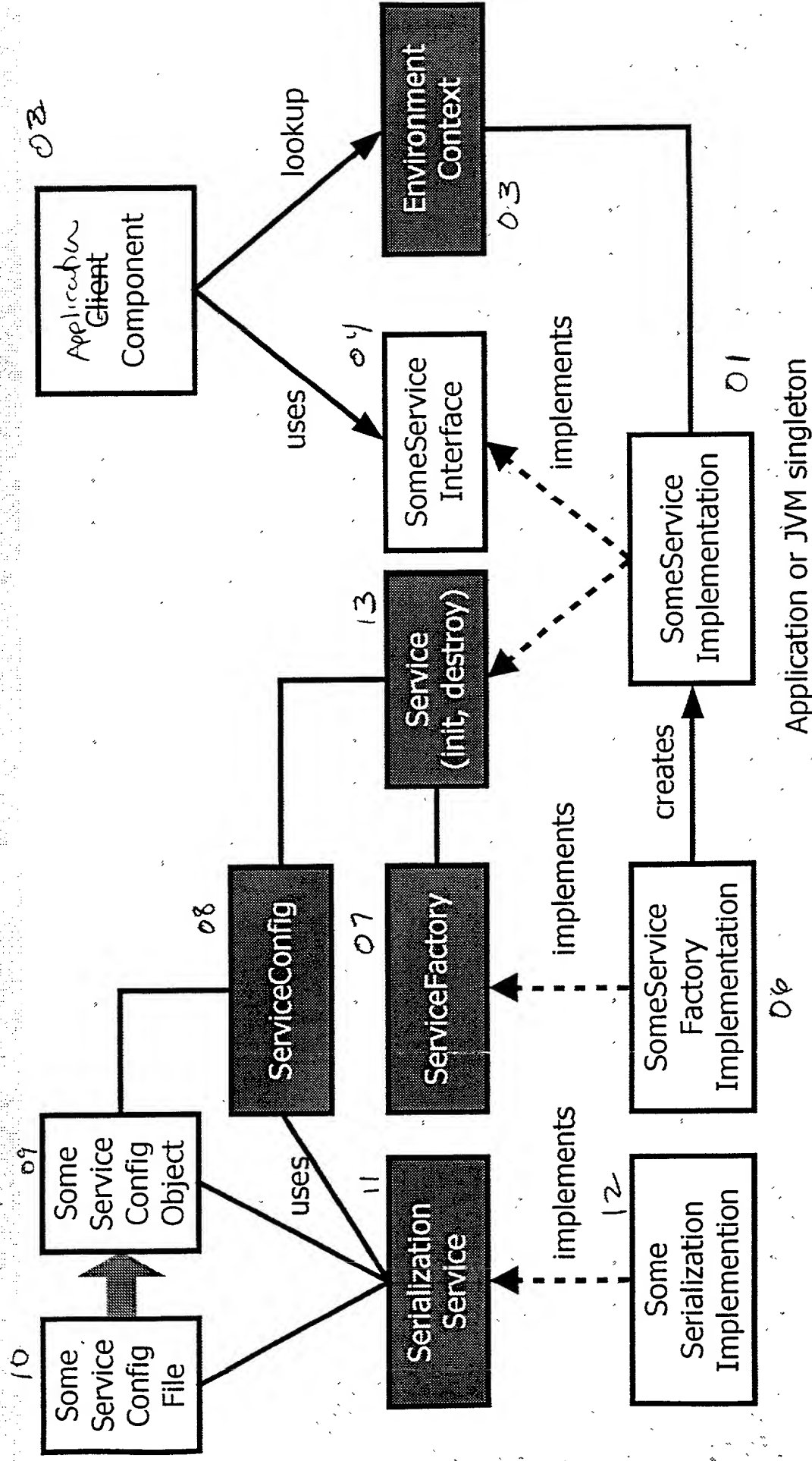


Fig 26

Service Framework Configuration

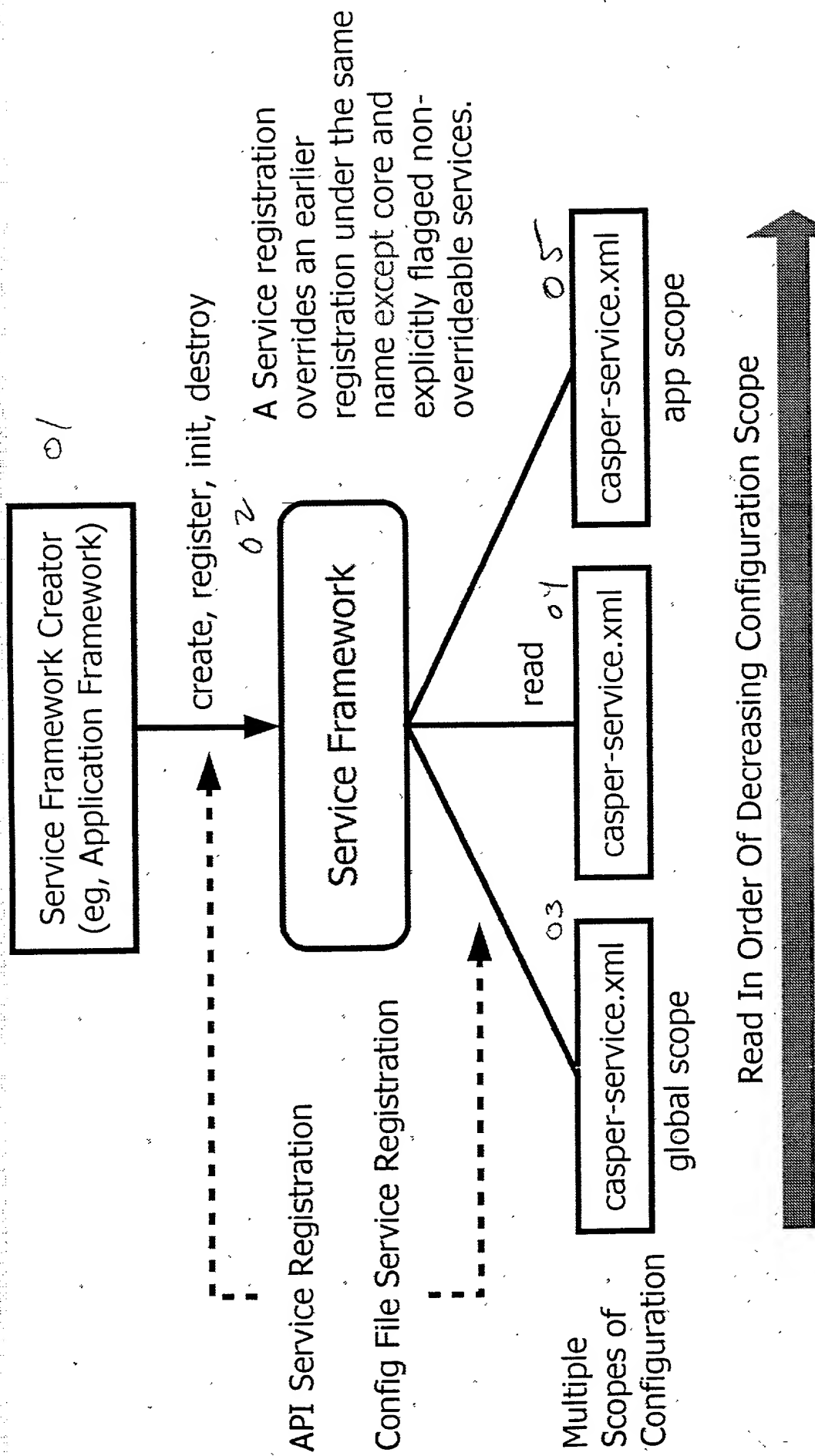


Fig 27

Service Table 01 02

Service name	Service Interface
config	
...	

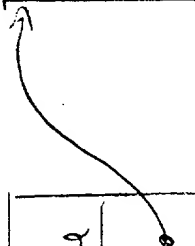


Fig 28

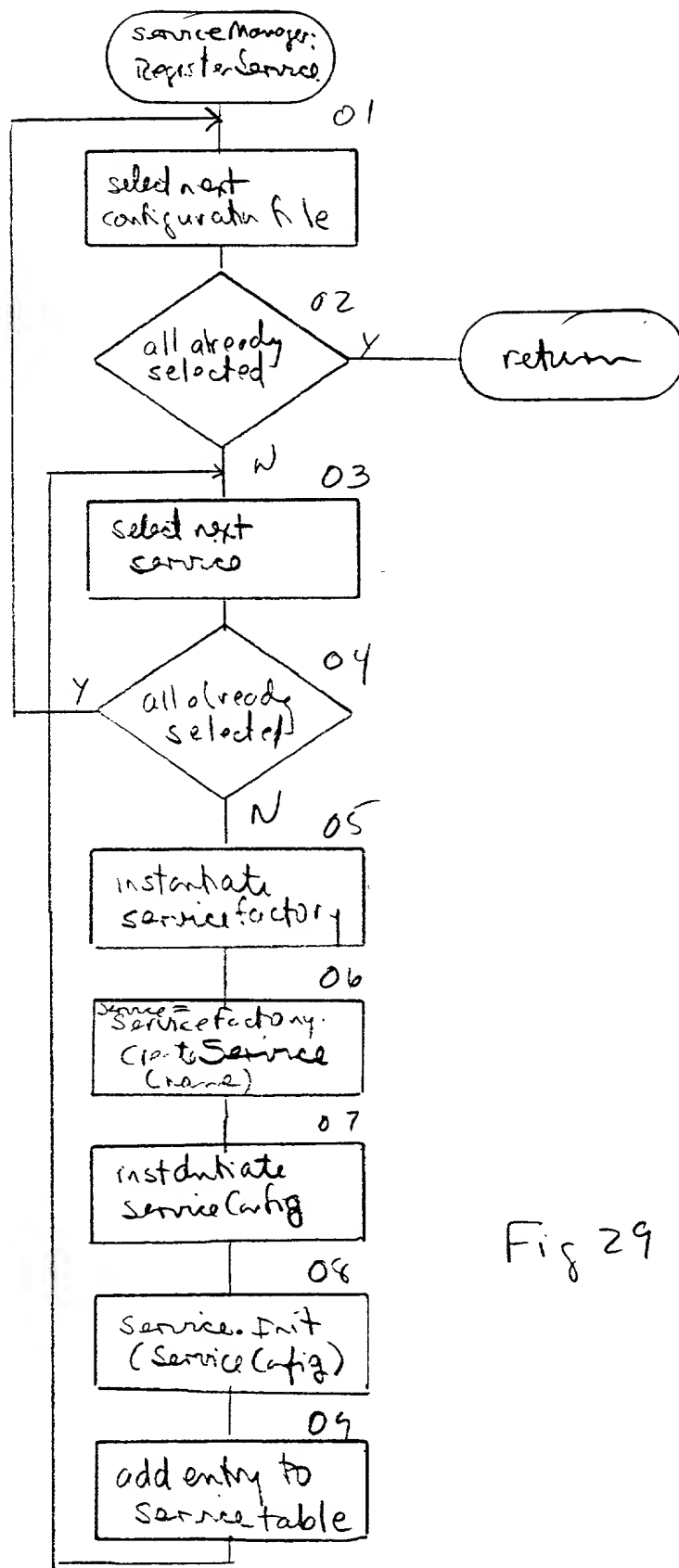


Fig 29

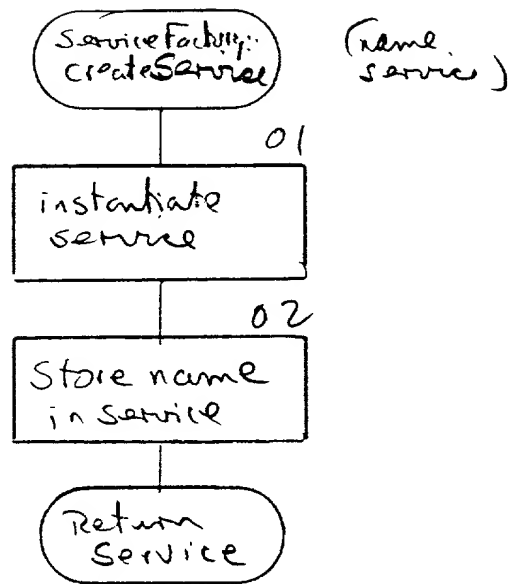


Fig 30

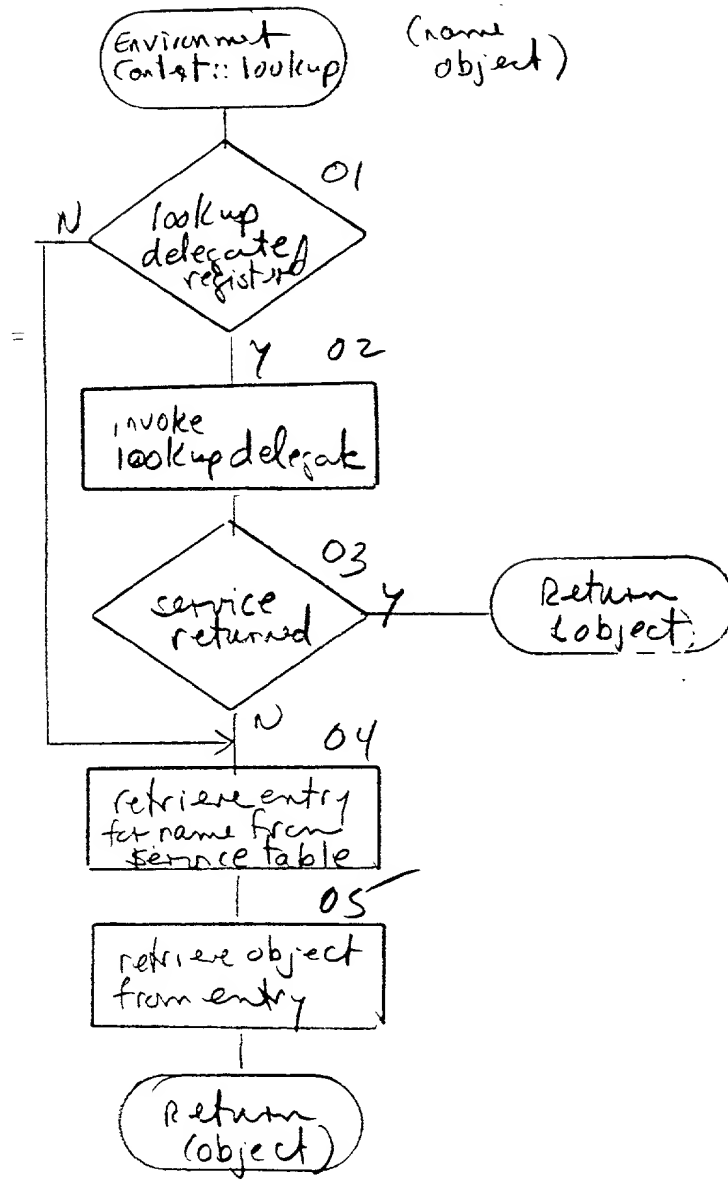
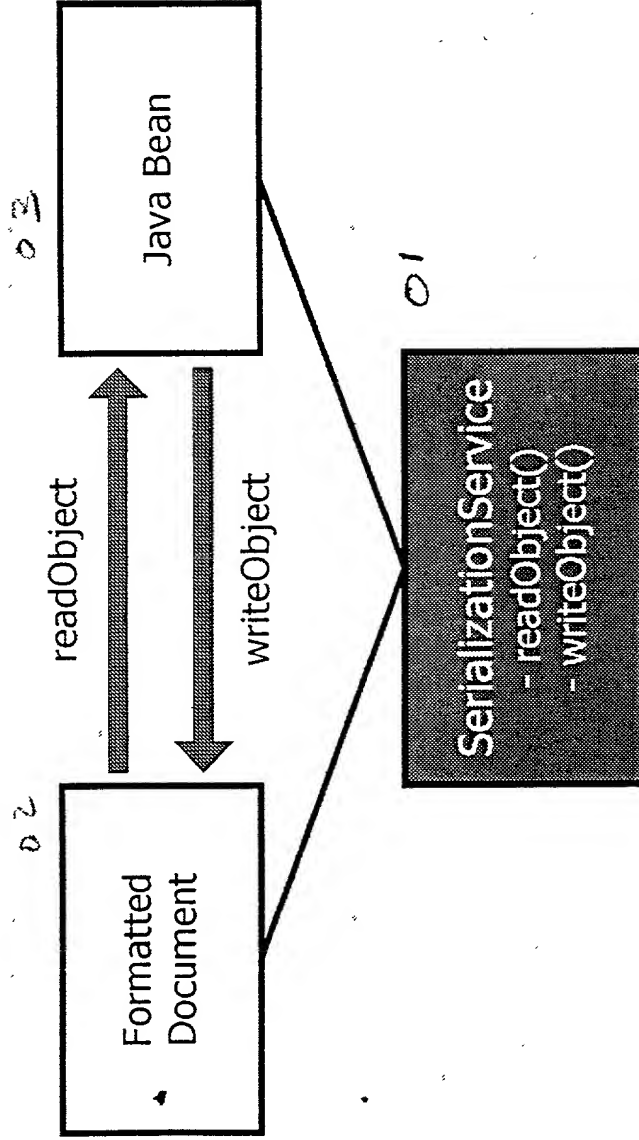


Fig 31

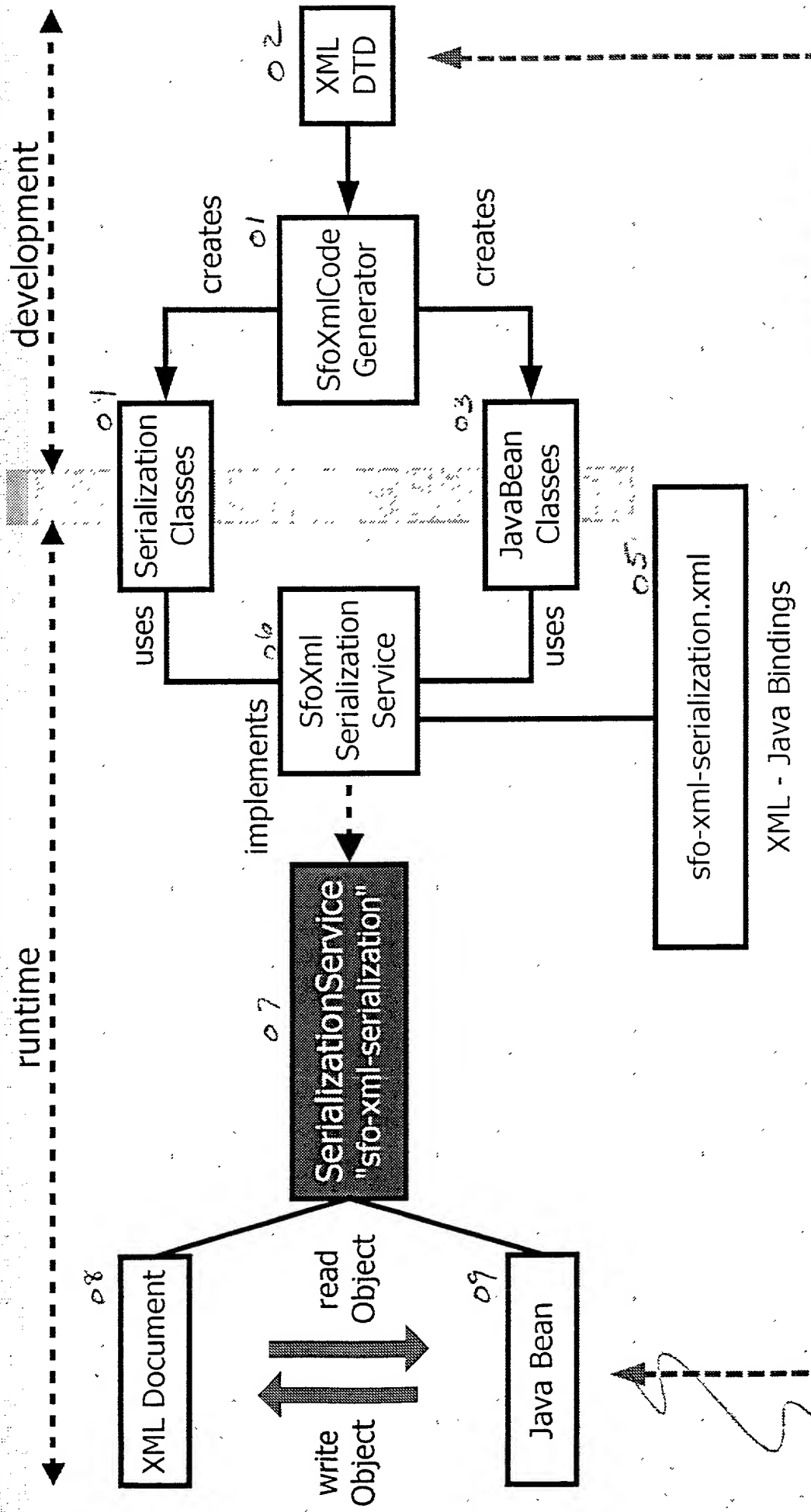
Serialization Service



A SerializationService is responsible for transforming and validating formatted documents to and from JavaBean objects

Fig. 32

Configuration Definition with SFO XML Tools



Configuration representations

Configuration schema defined with XML DTDs

Fig. 33

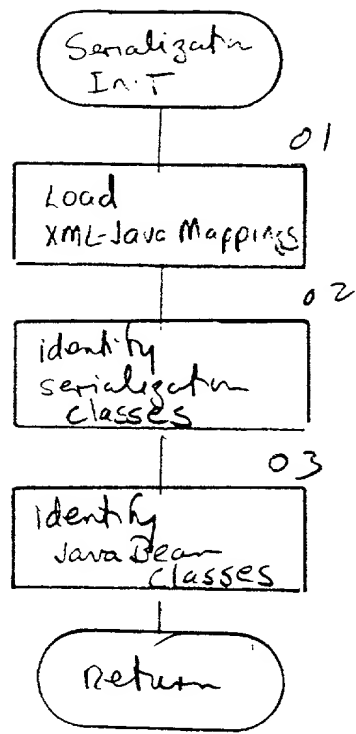


Fig. 34

Translator:
decodeToJava

(client format
message
application format)

01

Convert
message

02

SerializationService =
EnvironmentContext.
lookup("serialization")

03

javaObject =
SerializationService.
readObject
(message)

Return
javaObject

Fig. 35

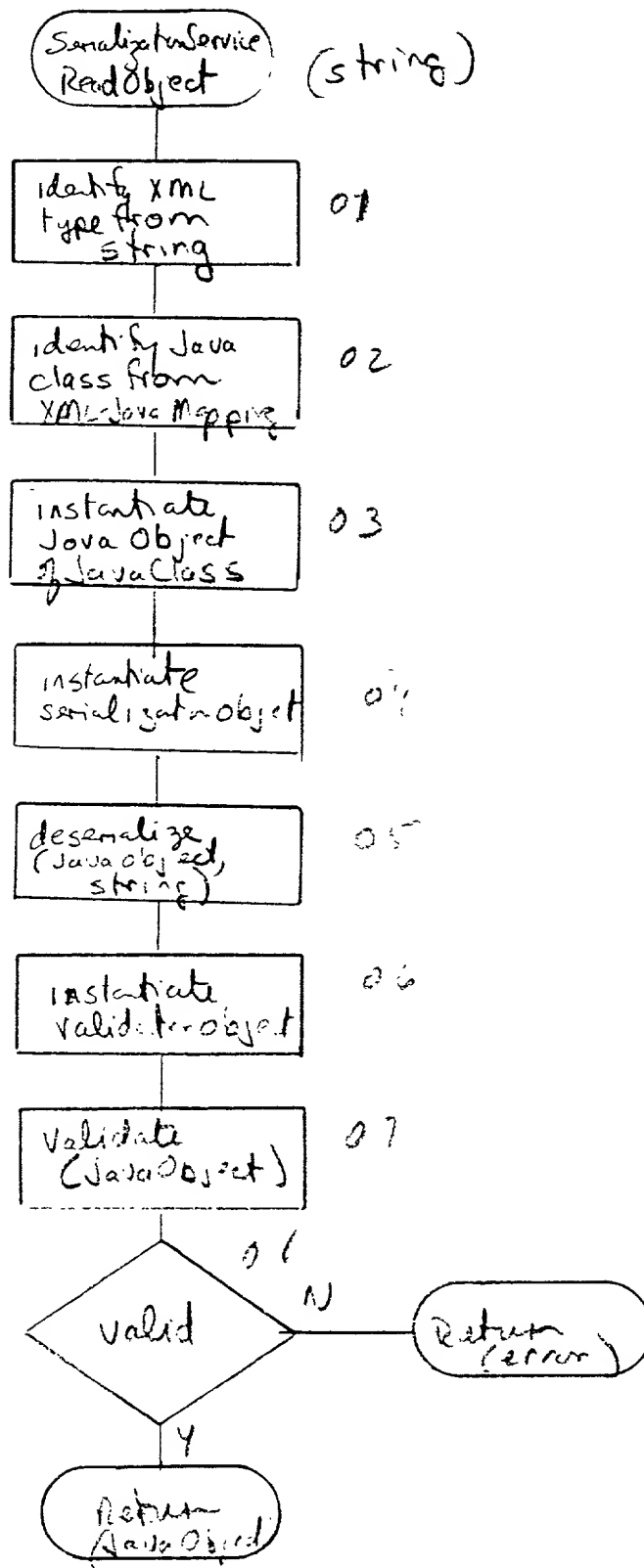


Fig. 36

Configuration Service

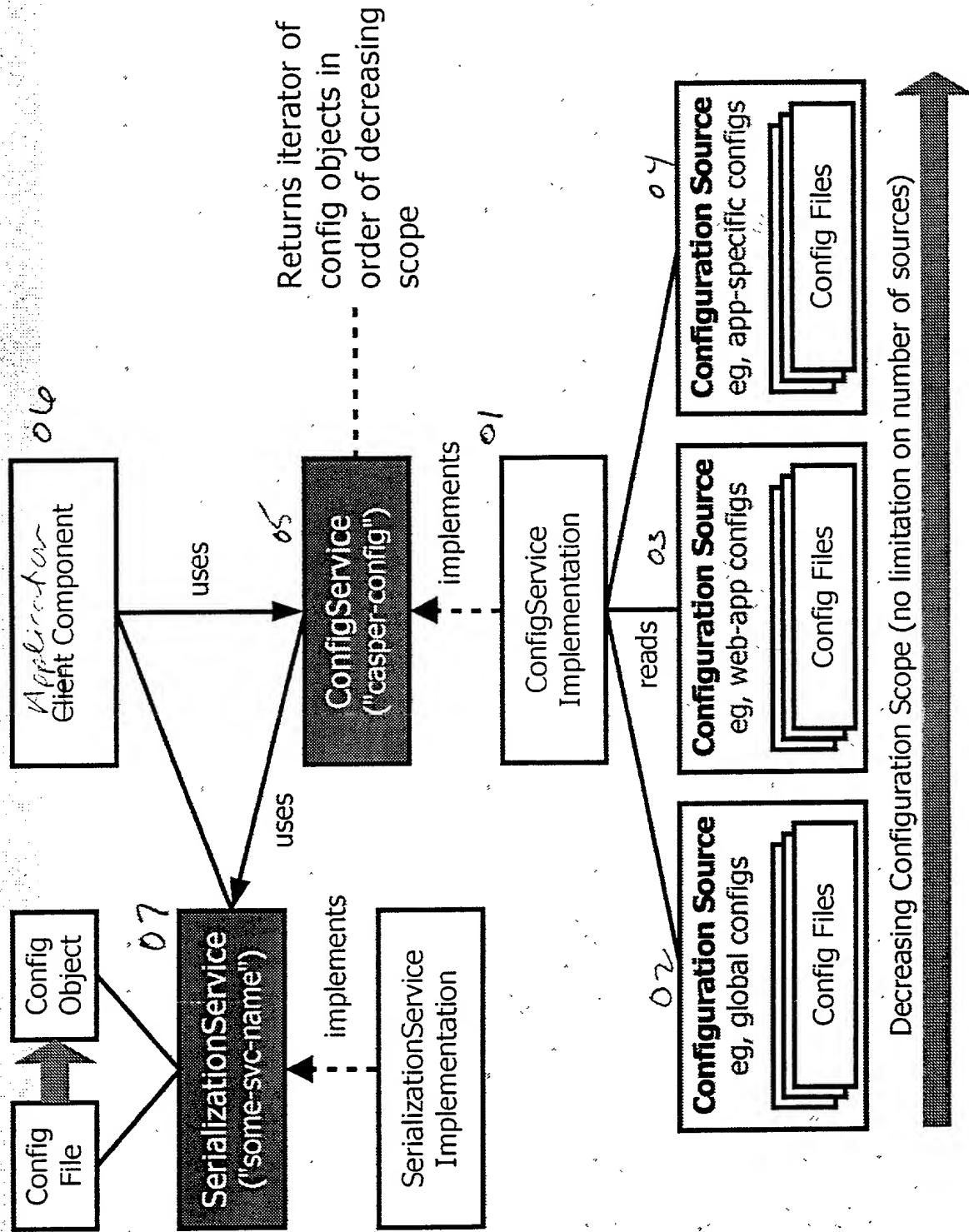


Fig 37

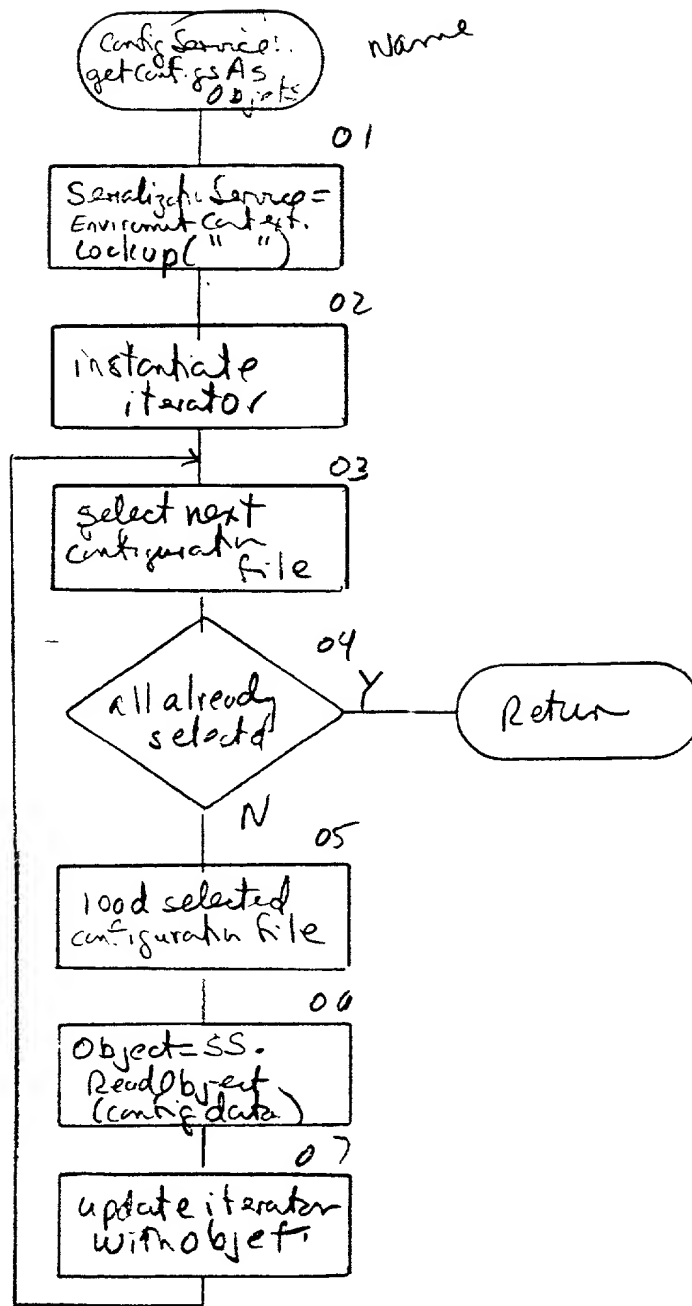


Fig. 38

Fig. 39

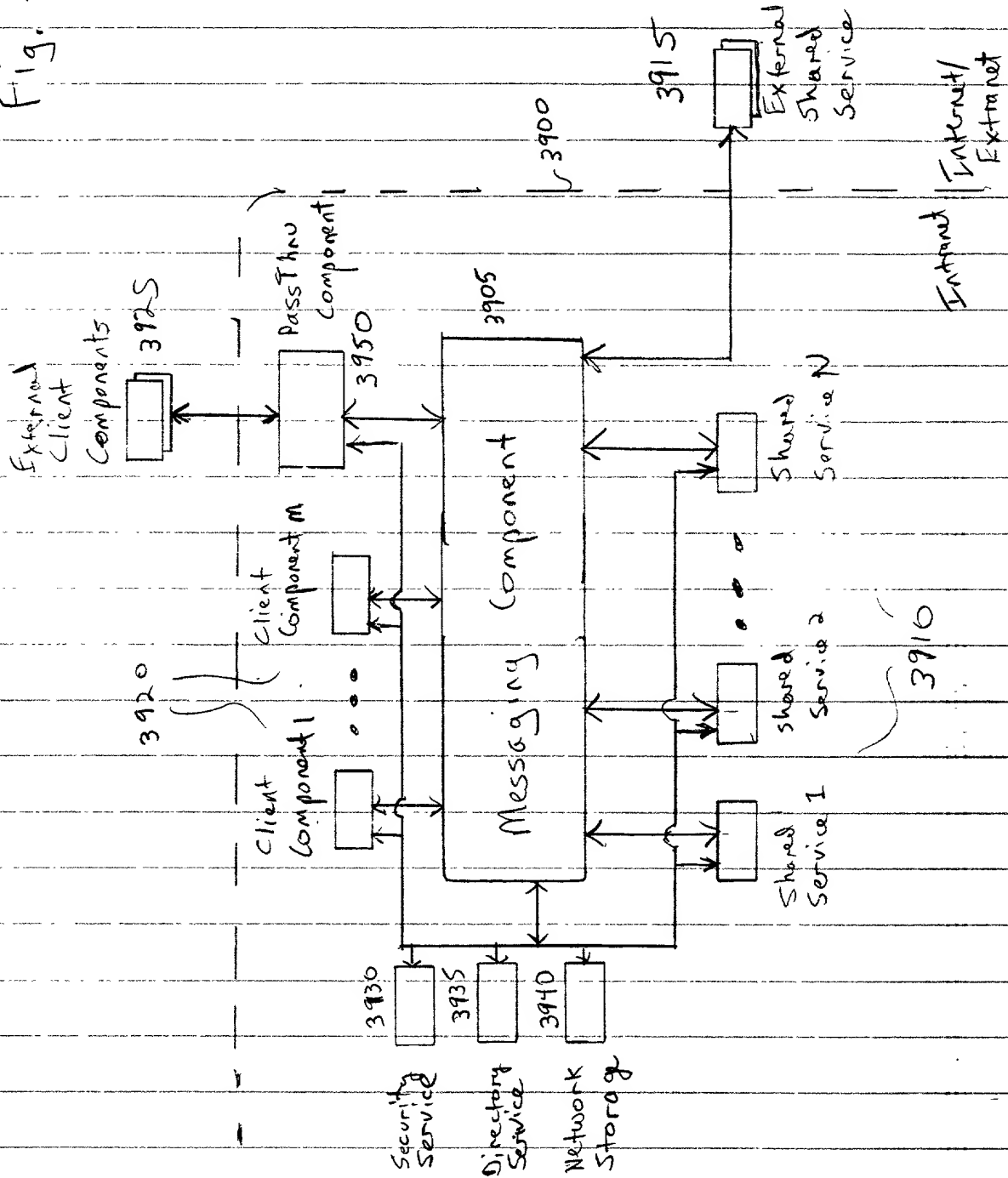


Fig. 40

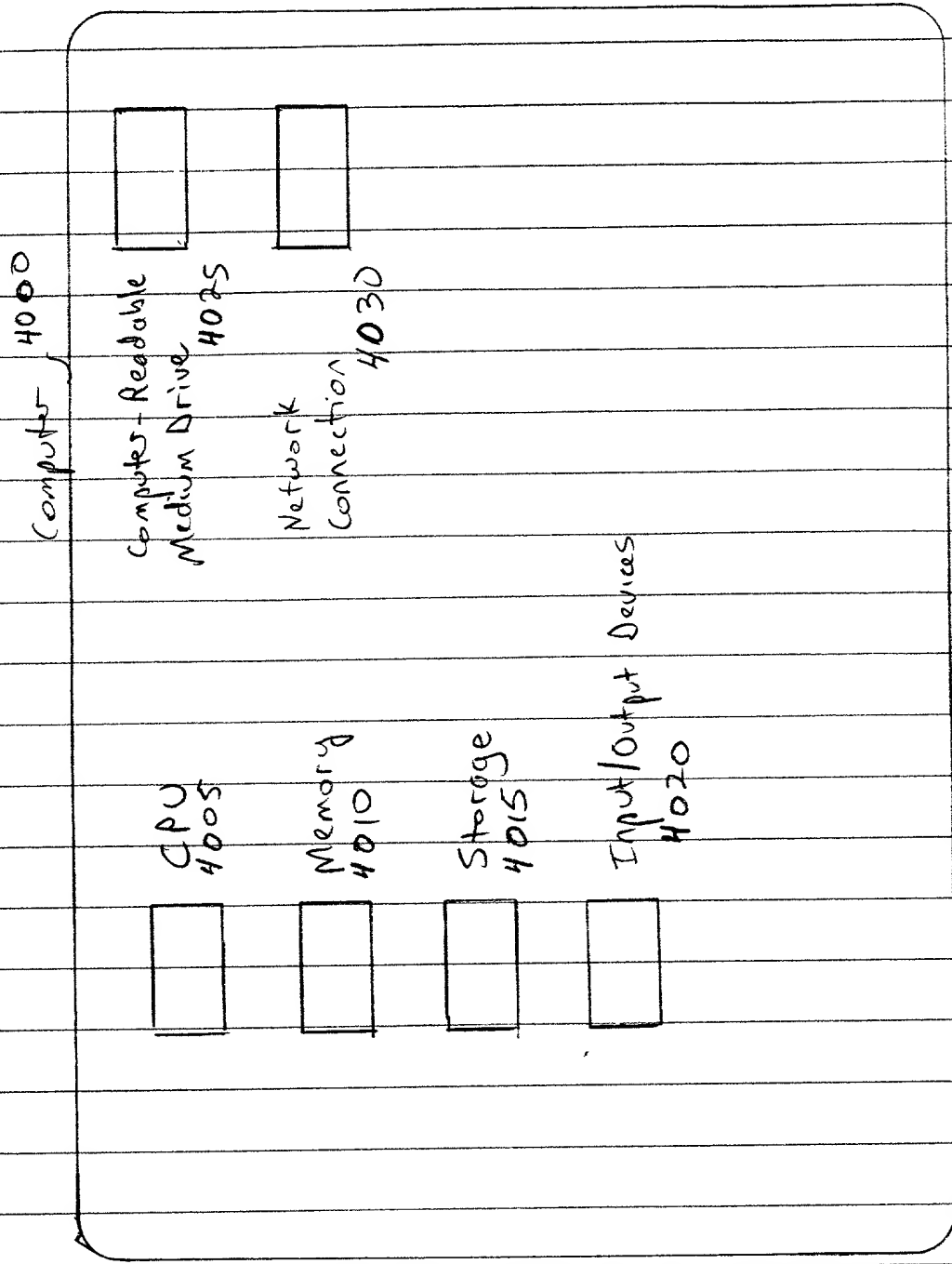
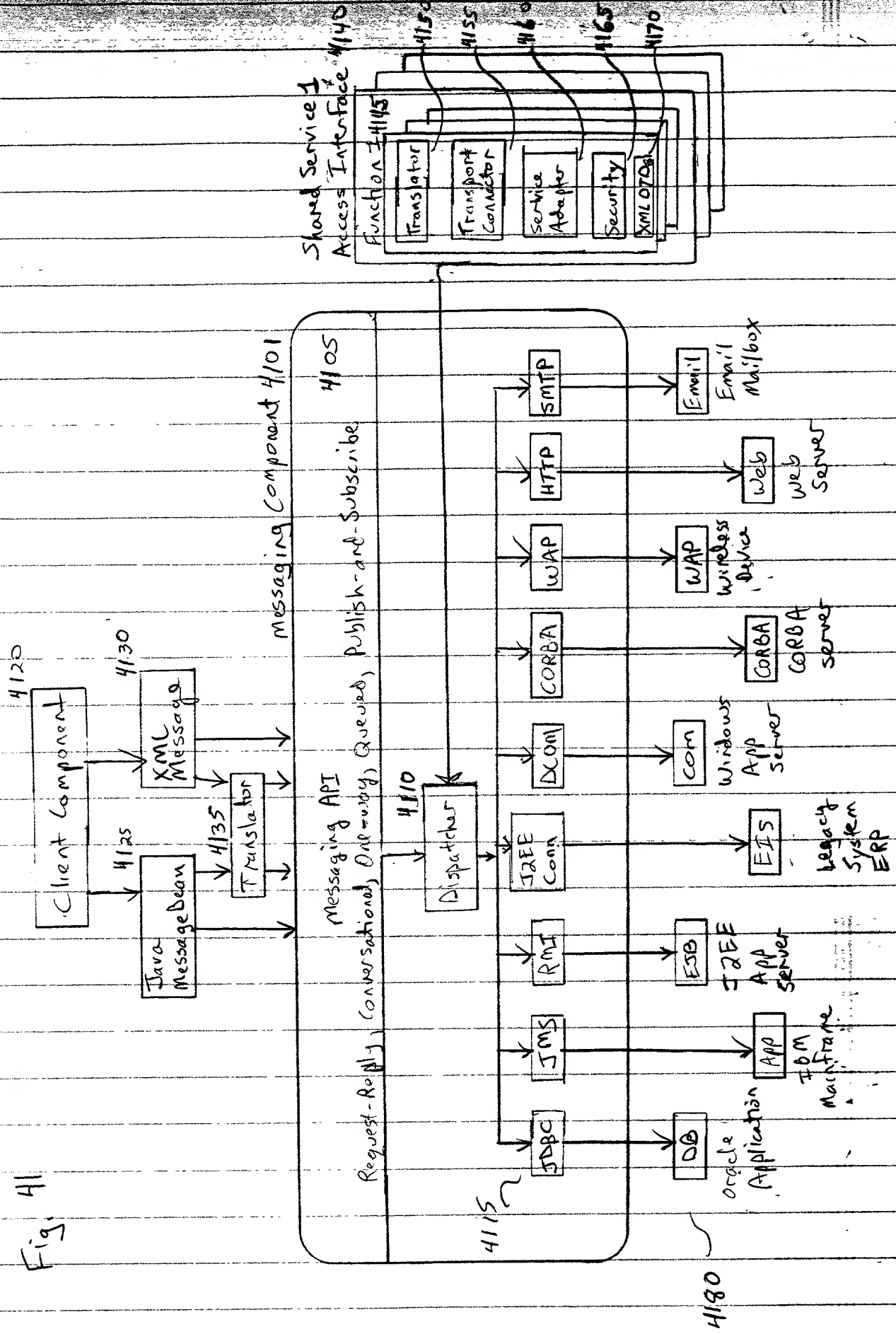
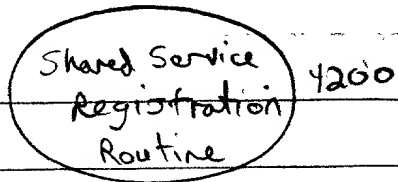


Fig. 41





Receive indication
of shared service
to be registered 4205

Select next
Function to be
registered 4210

Receive indication of
XML DTDs for request
message and optional
response messages 4215

Receive indication of
translator, transport
connector, service
adapter and security
component 4220

Store received function
information with a global
directory service 4225

Yes
More
Functions? 4230

Yes
More
services? 4235

END 4295

Fig. 42

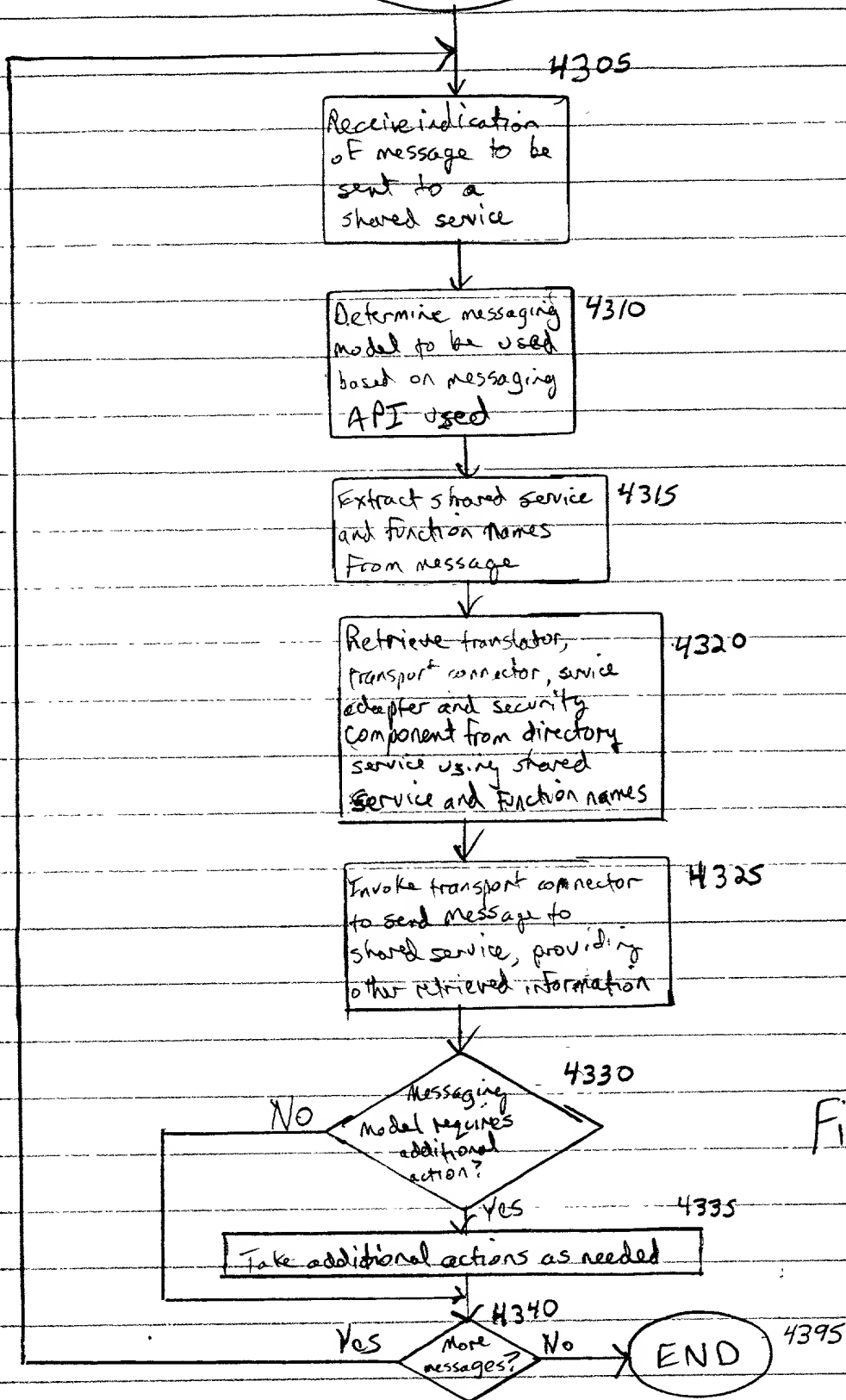
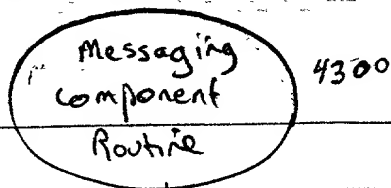


Fig. 43

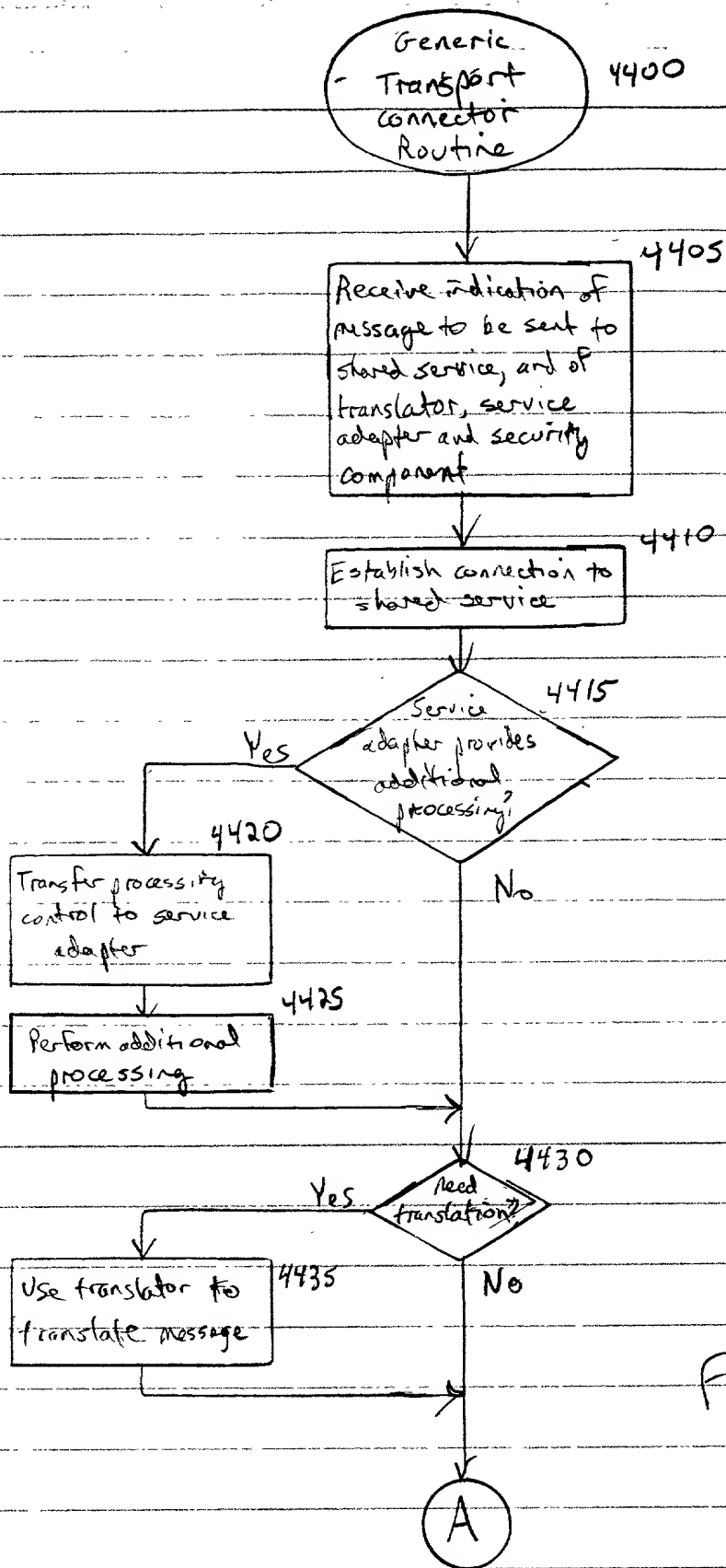


Fig. 44A

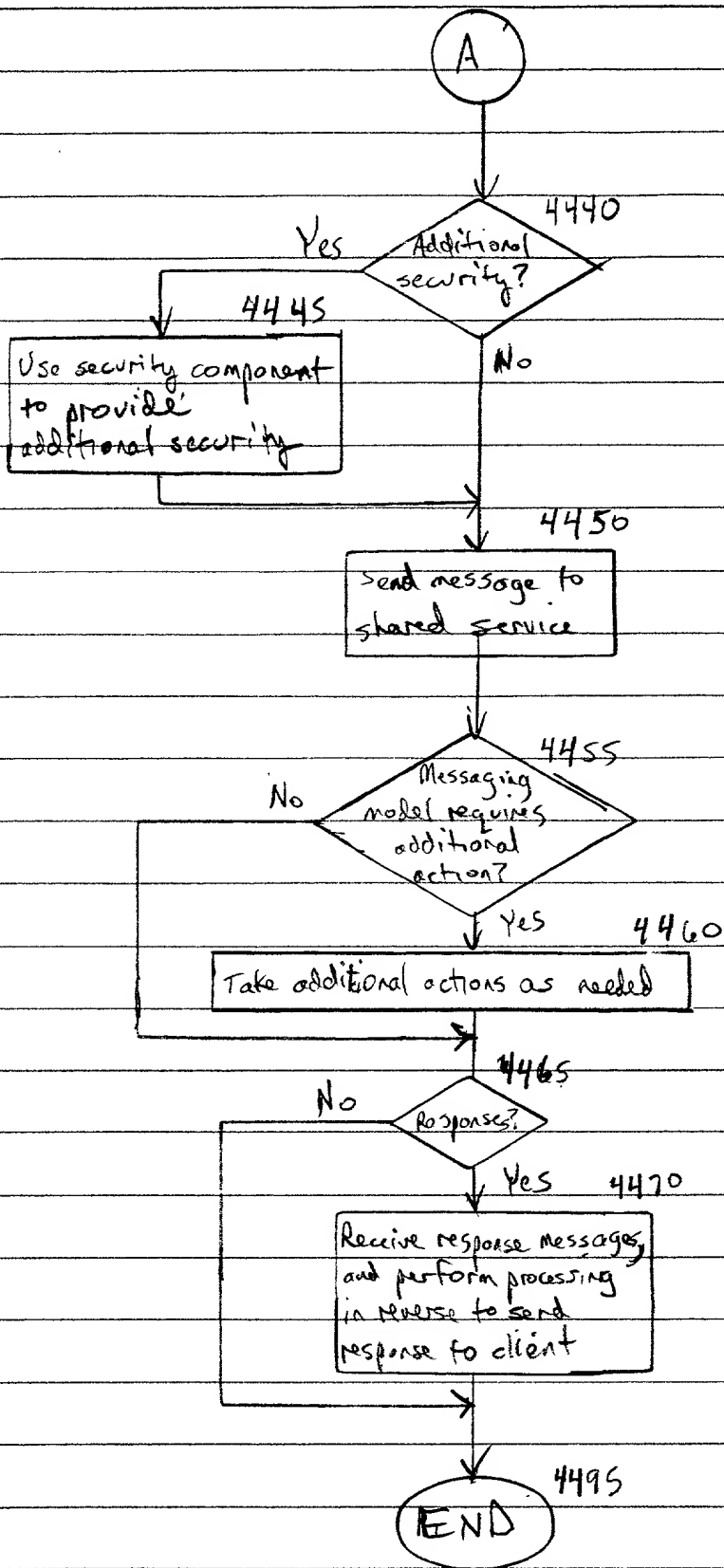


Fig. 44B

PassThru
Component
Routine 4500

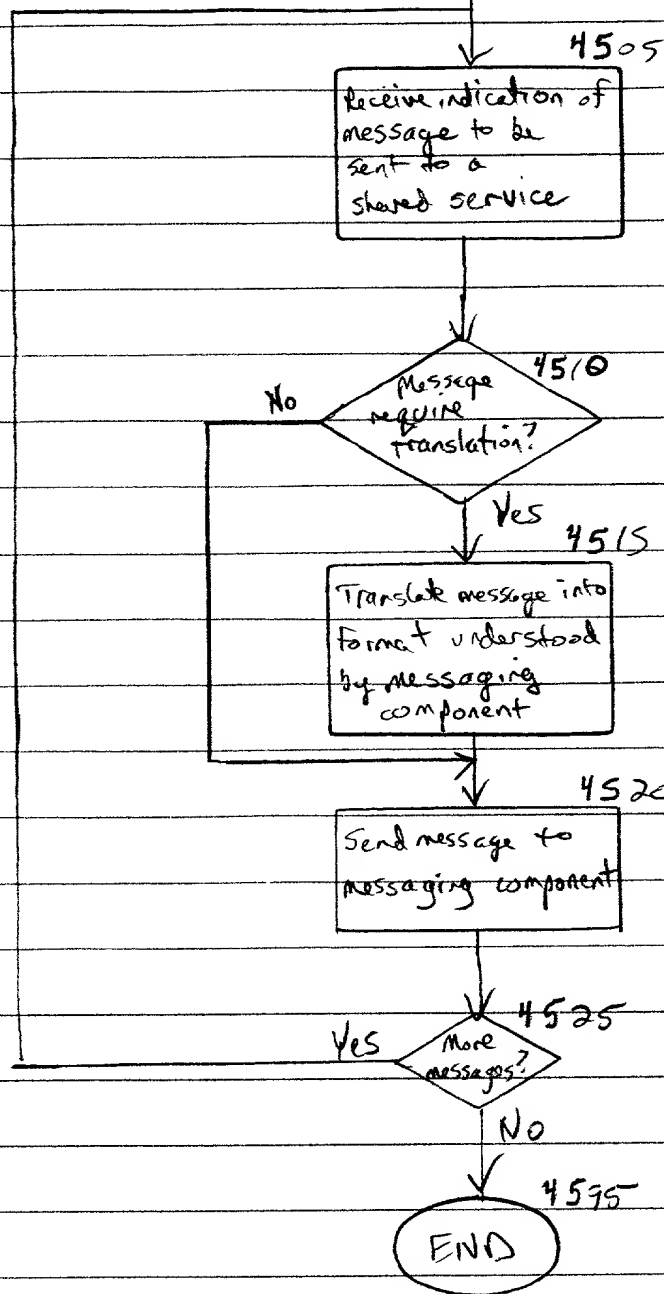


Fig. 45

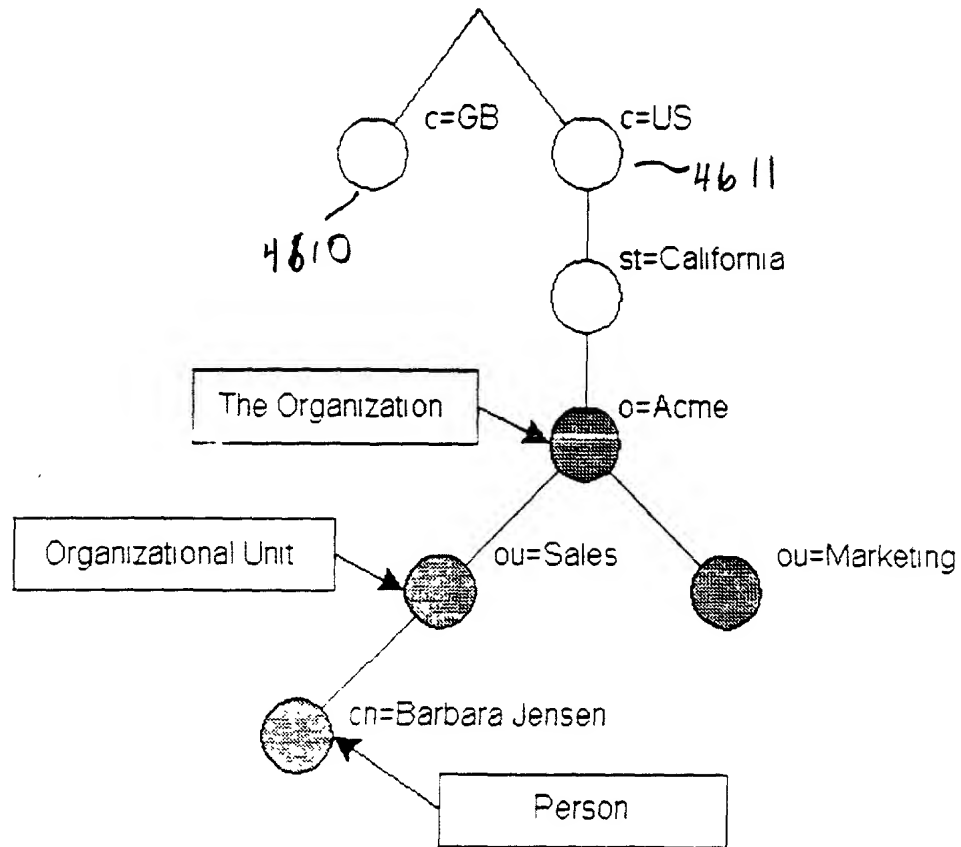


Fig. 46A

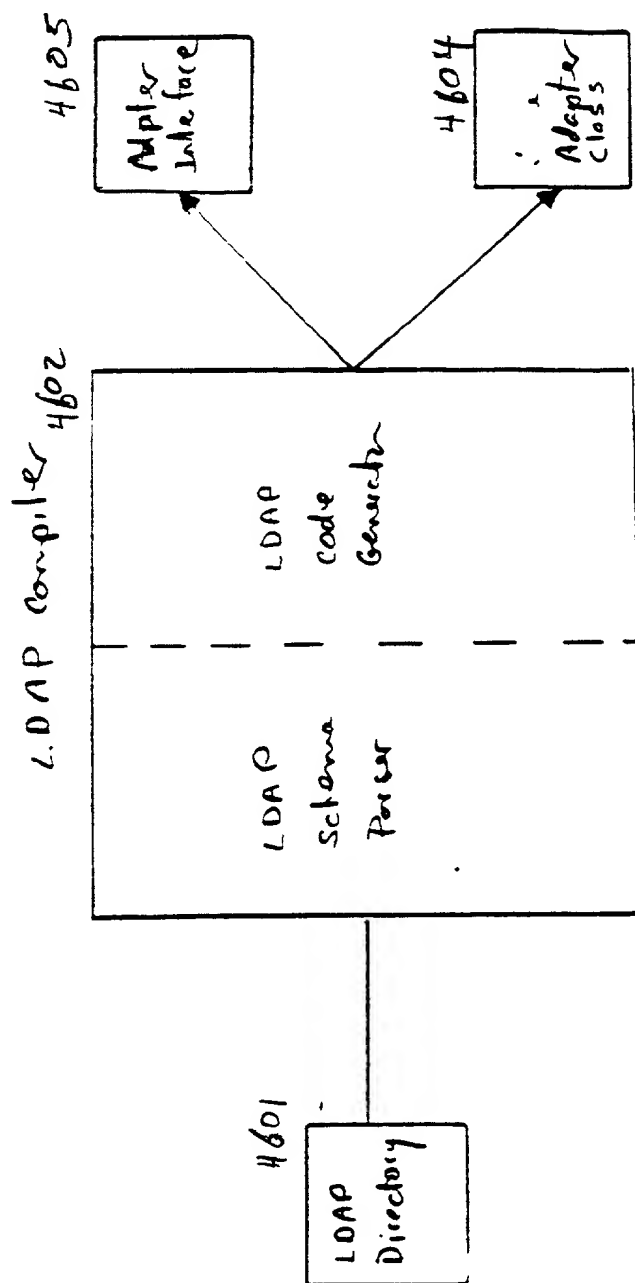


Fig. 46B

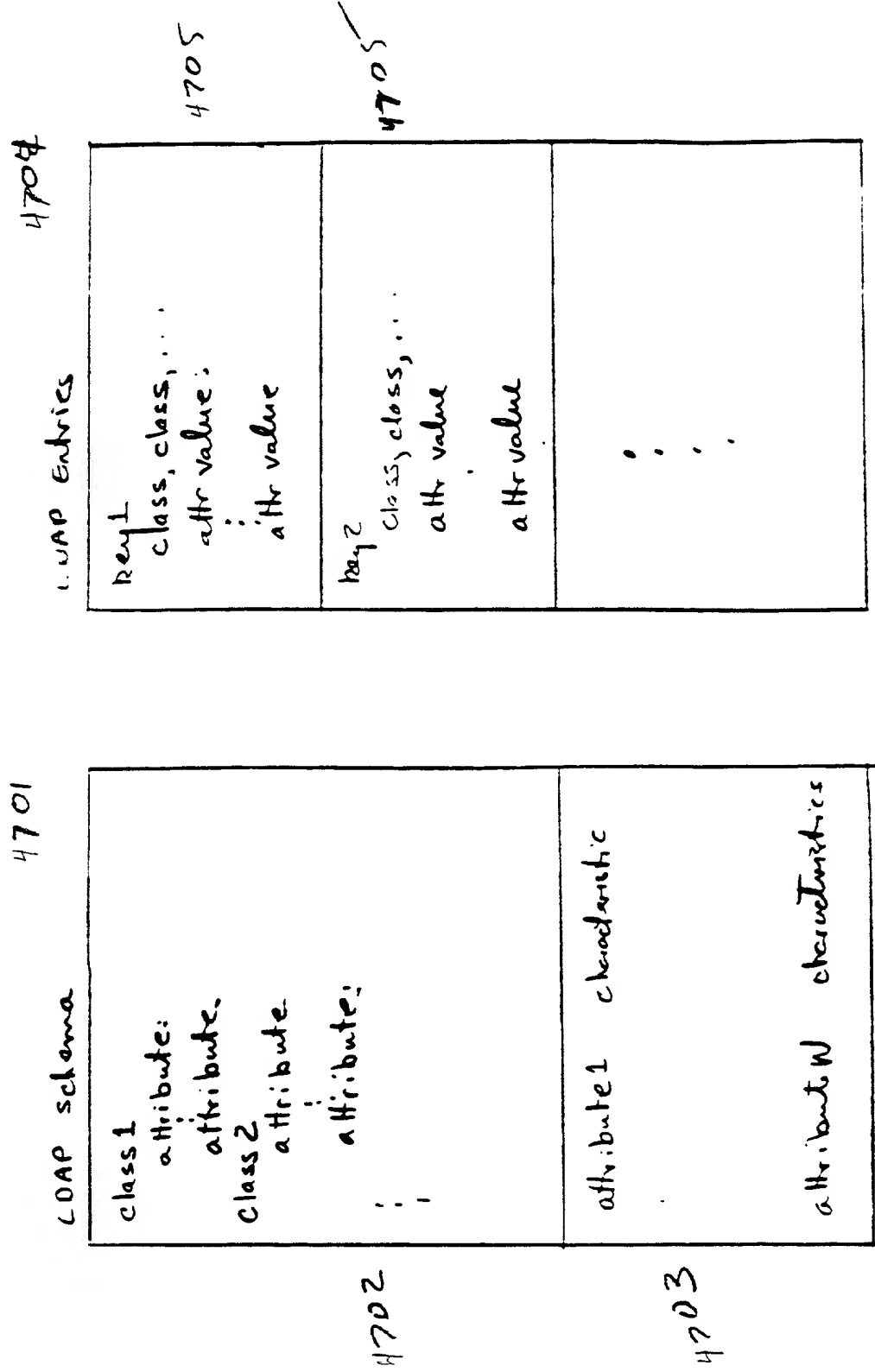


Fig 47

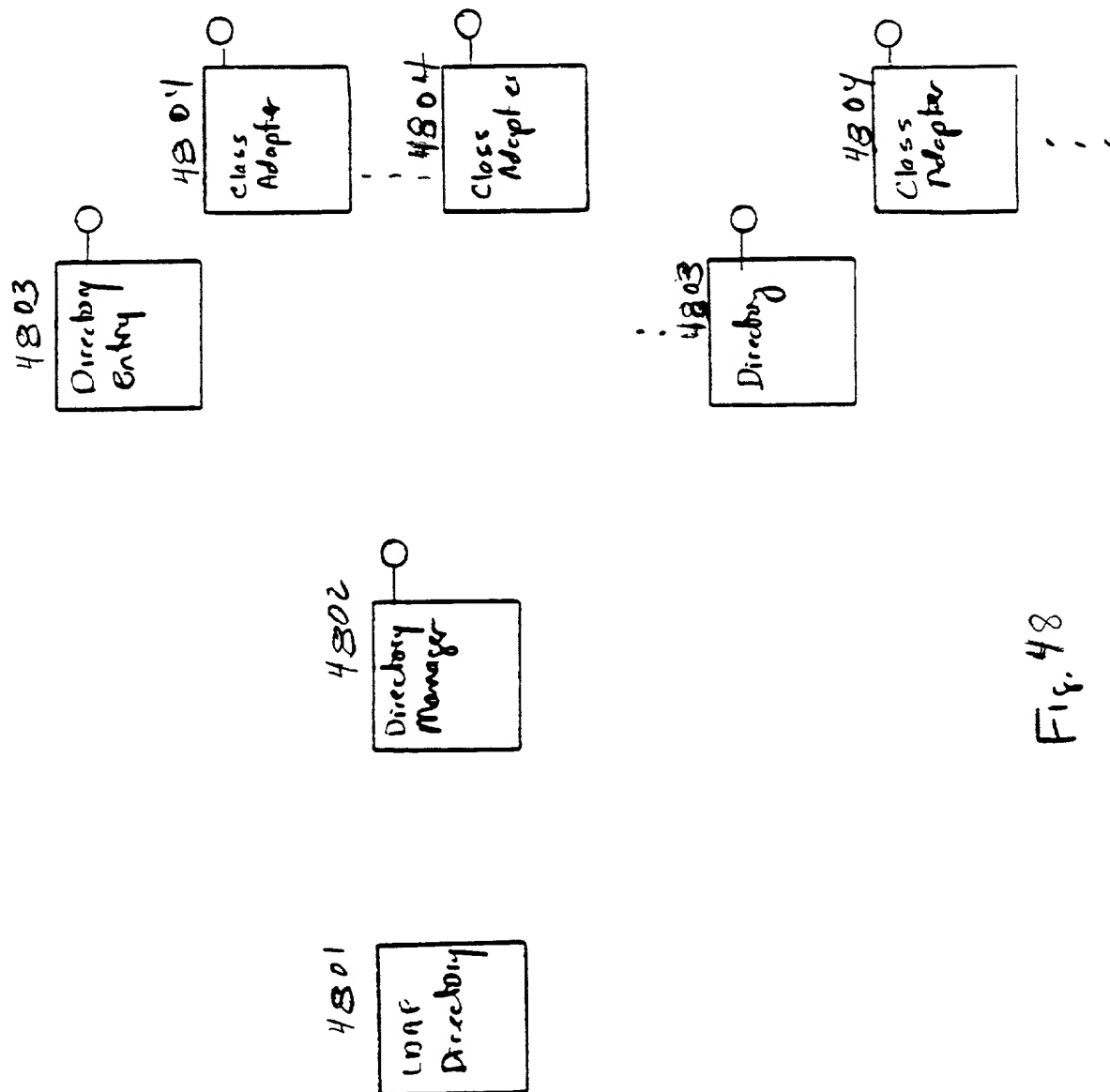


Fig. 48

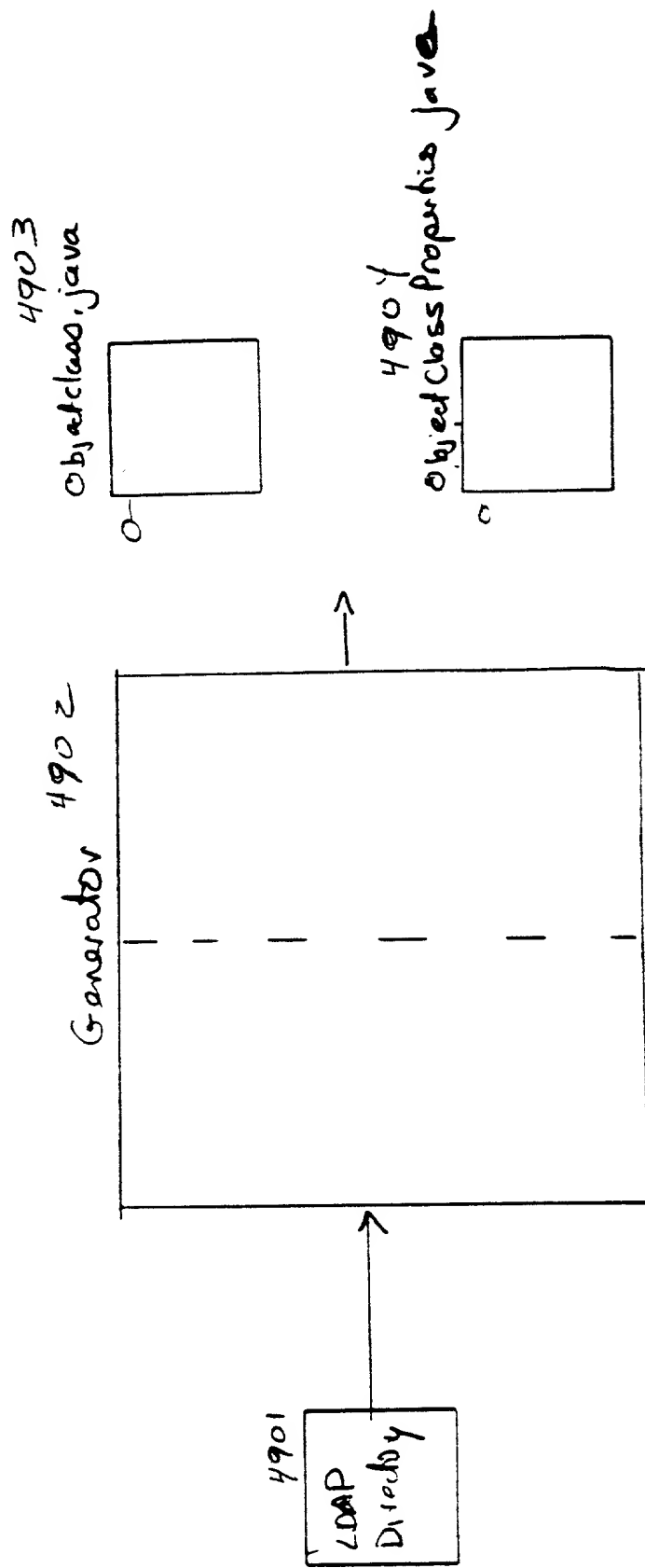


Fig 49

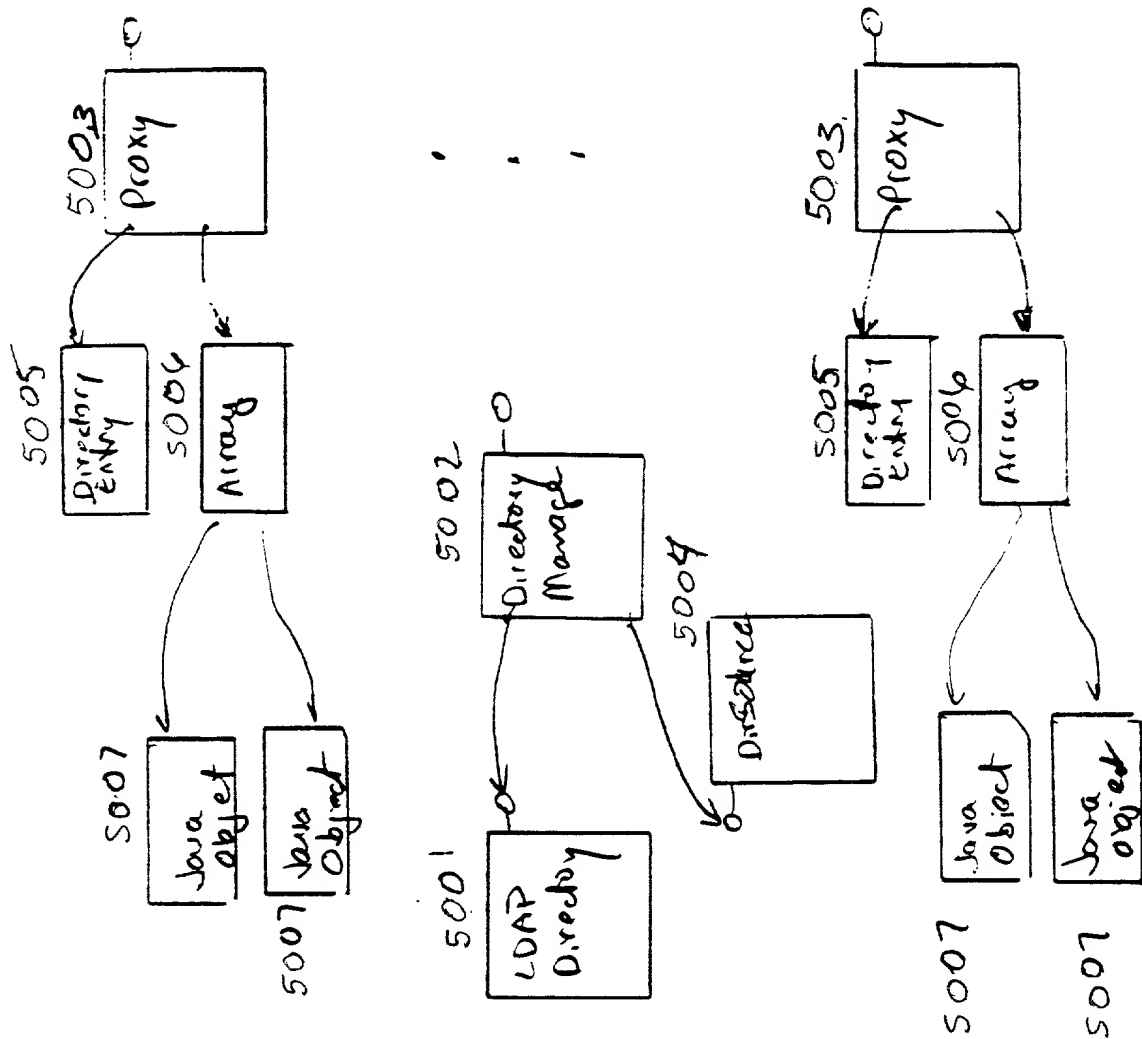


Fig. 50

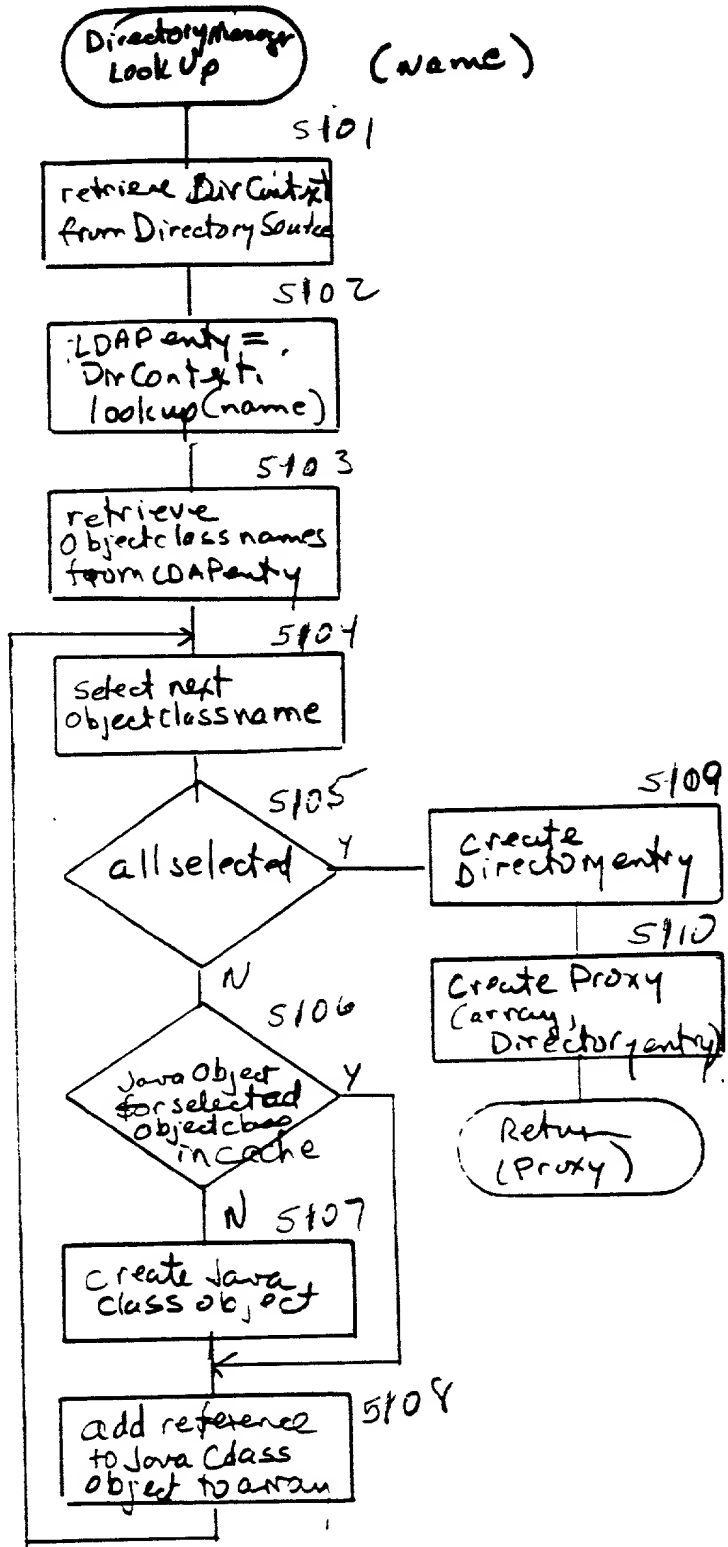


Fig. 51

CS7559-01001

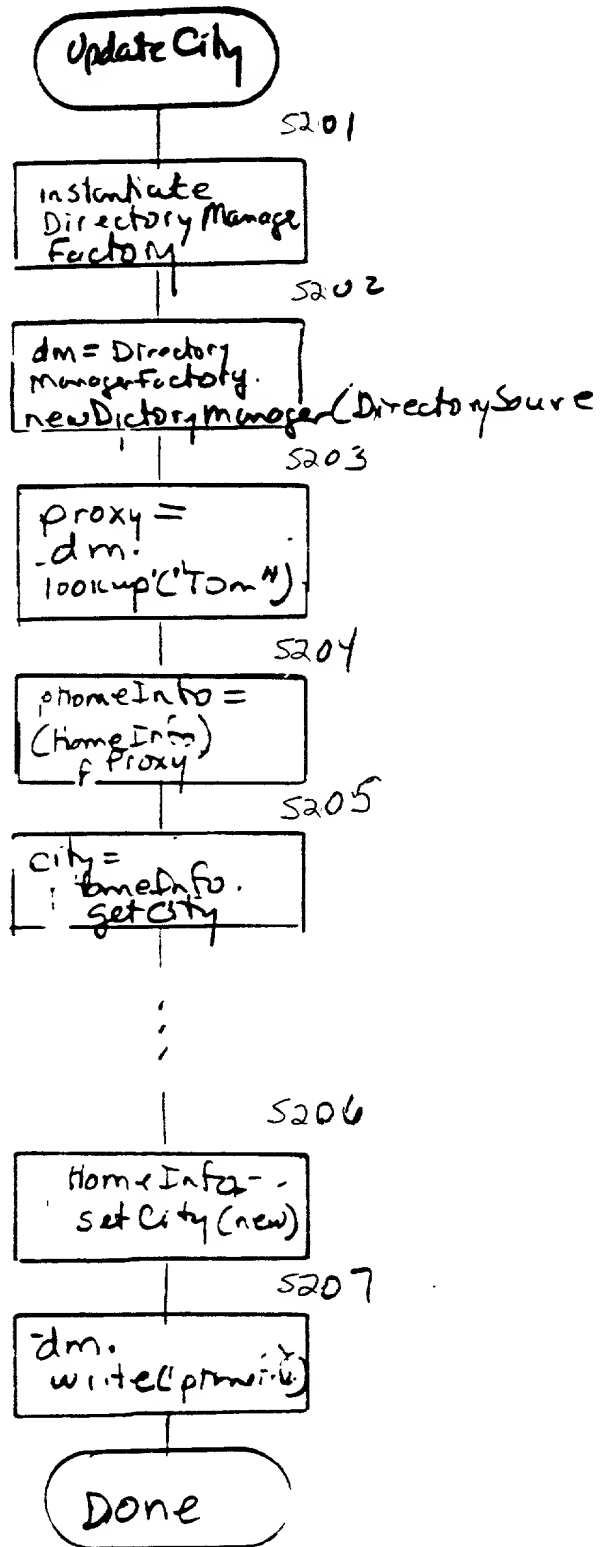


Fig. 52

(Homeinfo)
Proxy
getCity

5301

retrieve
reference to
DirEntry

5302

DirEntry.Invoke
("setCity", arg)

5303

city = arg.

Return

Fig. 53